Vol. XVII No. 7 JULY, 1910 Price, 10 Cents

Camera Craft

San Francisco, California

Answering Three Vital Questions

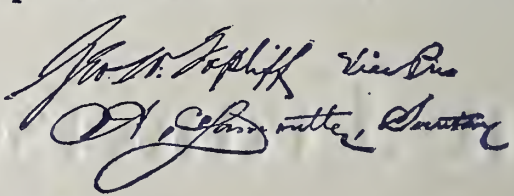
THE most prominent photographer in Chicago after trying one full gross of 14 x 17

Professional Cyko

admitted it was the best paper he had ever used, but laid special emphasis on the *uniformity* and *stability* of a paper as indicating its real value to the high class studio.

> "Now that I am satisfied with your emulsion and your raw stock I will ask you three questions:
>
> Is your emulsion always the same?
>
> Do you use always the same raw paper?
>
> Is your plant large enough to cope with the growing demand?"

To these three questions a representative of Cyko can answer "Yes" with the knowledge that his answer will be echoed by thousands of photographers who have used Cyko and by every independent dealer who has sold it for the last *ten years.*



Ansco Company

Binghamton, N.Y.

Note the transparency of shadows. The original photograph was even deeper, clearer, softer than this printed reproduction.

Where there is an element of doubt you are more certain to get a good photograph if your camera is loaded with

The "ANSCO" Film

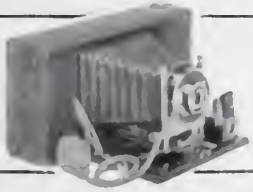
The exceptional latitude and speed of this film insure fine negatives under conditions that would mean failure with the ordinary kind. They compensate largely for incorrect judgment of light and time, reducing uncertainty of results to a minimum. The Ansco Film increases the value of your camera to you as an amateur. It enables you to make better photographs, more artistic pictures.

Ansco negatives reproduce every soft gradation of light and shade. They retain clear detail in high lights and transparency in shadows.

They have chromatic balance that gives a correctness of color tones unknown to other film

Made in sizes to fit every film camera. Non-curling; non-halation. Off-setting of numbers never occurs with this film. Our perfectly non-actinic black paper and properly prepared emulsion prevent it.

CYKO Paper is preferred alike by the wise professional and the knowing amateur. It gives deeper, softer, clearer prints from any negative, plate or film



Look for the Ansco Sign. There you will find a progressive, independent dealer selling the complete line of cameras and photographic supplies made by the Ansco Company.

No. 10 ANSCO, 3¼ x 5½

Beautiful Camera Catalog, also Two-Volume Photographic Library—Free. At dealers or write to

ANSCO COMPANY, Binghamton, N. Y.

RAPID : FINE-GRAINED
SOFT : UNIFORM

VULCAN
DRY PLATES

Fulfill the Most Exacting Requirements of the
PROFESSIONAL and AMATEUR
PHOTOGRAPHER

A Low-Priced Plate Which Challenges Comparison with the Best

Defender Photo Supply Company

ARGO PARK, ROCHESTER, NEW YORK

SENECA FILMETTE CAMERAS

AT

Vacation Prices

2¼x3¼	Regular	$3.00,	Special	$1.80
3¼x4¼	"	5.00,	"	3.35
3¼x5½	"	6.00,	"	4.00
4 x5	"	6.00,	"	4.00

ALSO A FULL LINE OF SENECA CAMERAS IN STOCK

Send for Sample Prints on Argo
The Developing Paper That Suits
All from the Novice to the Critic

DO IT NOW

Sunset Photo Supply Co., Inc.

895 Market Street, San Francisco

MAX L. SHIRPSER
President

F. A. WOODWARD
Secretary

OUR CARD RACK

KANSAS CITY the Stock House that always carries the right goods, really gives prompt service and quotes the right prices.
Z. T. BRIGGS PHOTO SUPPLY CO., 914 Grand Ave., Kansas Cy, Mo.

St. Louis-Hyatt Photo Supply Co. solicit orders from photographers who appreciate prompt shipments and best goods at lowest prices.
St. Louis-Hyatt Photo Supply Co., 805 Wash. Ave., St. Louis, Mo.

Make Trays For fixing boxes, sinks and trays a coating of Probus Preservative Paint is just the thing. Pint tins 65c. At all dealers.
Wolff & Dolan, 821 Mason Street, San Francisco, Cal.

SAFETY FUSES No more burnt fingers. Be in your flashlight pictures. Absolutely sure. Sample box 15 cents postpaid.
THE LUXO CO. 2111 Hunting Park Ave. Philadelphia.

Improve your flat, lifeless prints with

LUSTRALENE

It works like magic; making a wonderful improvement. Imparts depth and transparency to the shadows and a delightful sparkle to the high lights. Does not discolor or injure the most delicate print. Price per tube, 25c.; trial tube for 4c. in stamps and name of your dealer.
Geo. C. Elmberger, 5553 Leland Ave., Chicago

Graflexes, Kodaks,
Anastigmat Lenses
Up-to-the-minute high-grade outfits at
Square Deal Prices
Send Stamp for Special Bargain List.

WILLOUGHBY & A SQUARE DEAL
814 Broadway New York

CAMERAS
LENSES AND ACCESSORIES

Kruxo Paper—Dry Plates—Eastman and Ensign Films Prepaid

Bell's Panorama Camera with Anastigmat Lens, $25 prepaid

Interesting prices quoted on any camera or outfit made. A postal brings catalog.

J. M. Hamilton Camera Co. Waterloo, Iowa

REMOVAL SALE

The Greatest Bargain Sale of Cameras, Lenses and Photographic Supplies

Send for Bargain List

N. Y. CAMERA EXCHANGE
Dept. B. 109 Fulton St., New York

SAVE YOUR MONEY by buying your photo supplies from us. Prices our proof. Everything Photographic. Give us a trial.
Northern Photo Supply Co., 318-320 Fourth Ave. So., Minneapolis.

INDIANAPOLIS For "Quality" photo finishing and bromide enlarging and prompt and efficient work, address
THE H. LIEBER CO., 24 W. Wash. St., Indianapolis.

JACOBY'S PLATINUM the finest sepia platinum paper on the market. Try the Japan tissue for a novelty.
W. HEUERMANN Importer, 97 Liberty Street, New York.

DAGUERREOTYPES Restore them if faded or discolored. A bottle of Brock's Reclarifier treats 100. $1.25 postpaid.
N. BROCK, Marshall Bldg. Asheville, N. C.

WRIGHT, Racine Wisconsin
PHOTO SUPPLIES ENLARGEMENTS

Big discounts on 1910 Cameras—Wholesale Prices on Korona and Seneca goods.
We have, as an example, a $3\frac{1}{4}$x$4\frac{1}{4}$ Folding Plate Camera, with bulb and hose, automatic shutter, complete with plate-holder, $3.60.
Write for complete price list of cameras and supplies, developing papers, etc.
Bromide Enlargements, the better kind, made on English or American papers, 8x10, 45 cts. postpaid. Get our complete list.
We develop 6 and 12 exposures at 10 and 15 cts. per spool.

WRIGHT, Photo Supplies, Racine, Wis.

Camera Exchange

KODAKS AND SUPPLIES

I buy, sell or exchange all kinds of

Photographic Apparatus

Something you want for something you don't want

DEVELOPING AND PRINTING

W. F. Lynch 250 Market Street San Francisco, Cal.
FORMERLY WITH T. P. ANDREWS

RALPH J. GOLSEN SUPPLY CO.
THE ORIGINAL "LENS MAN"

APPARATUS AND **LENSES** OF EVERY DESCRIPTION

No. 27 Outfit Catalogue and Bargain List

ready July. Send for estimate before buying photographic goods. Complete Outfits a Specialty.
Supplement to No. 26 Bargain List Now Out.

84 WABASH AVENUE CHICAGO

THAT MAN PITTS

A FULL LINE OF PHOTO SUPPLIES

Cutlery, Leather Goods, Stationery, Etc., Etc.

2 STORES

771 MARKET STREET
1123 FILLMORE STREET

SAN FRANCISCO CALIFORNIA

OPEN EVENINGS

Low Rates on Developing and Printing

LENS BARGAINS Being near New York, I can assist you in securing a good lens cheap. Sent on approval. V. A. Wood, Ridgefield Park, N. J.

Back Numbers Wanted

Some of our subscribers want back numbers to fill out their files for binding. We will list each month such numbers as are wanted. Those having back numbers should watch this advertisement regularly.

May 1900	June 1908
December 1902	August.....1908
July.....1903	September ... 1908
February 1909	

Send only such issues as are listed above and be sure that the reading pages and the frontispiece are complete. In return, we will extend your subscription ten months for an issue of 1900, nine months for an issue of 1901, eight months for an issue of 1902, and so on. Mark the wrapper plainly:

CAMERA CRAFT,
713-715 Call Building,
Subscription Dept. San Francisco, Cal.

FAMOUS FEMALE STATUARY post cards, 6 for 25 cents; also a few bargains in slightly used cameras; particulars free. Chas. Durso, 181 Worth Street, New York.

Art Studies

PHOTOGRAPHS FROM LIFE MODELS
Finest Collection for Artists and Art Lovers

Illustrated Catalogue sent free on demand

C. KLARY 103 Avenue de Villiers PARIS (FRANCE)

MAKE MONEY

With one 5x7 view camera in out-door view work. I have made more than

$100.00 A WEEK

You can do as well. If you are not making money it is your own fault. Get into the out-door view business and gain both health and money. My complete system of working lessons will tell you all about the schemes to be worked and secrets to learn to get the coin. For prices, etc., write

J. H. Barnes 609 Gearing Ave. Pittsburg, Pa.

Please Mention Camera Craft when Corresponding with Advertisers.

Jewelry With Semi or Real Enamel

MINIATURES

Any Photograph Reproduced
Pretty Articles for Presents

Patent Novelty

ENLARGEMENTS IN SEMI-ENAMEL

Catalogue Price List sent free on application to retailers only.

PHOTOGRAPHIC ENLARGEMENTS

No. 10 Catalogue, English edition, with retail prices
No. 11 Catalogue, English edition, without prices
State exactly the edition desired

JULIUS SCHLOSS & CO.

Frankfort a Main 47 Germany

LEARN PHOTOGRAPHY.

Photo-Engraving or 3-Color Work

Engravers and 3-Color Operators earn from $20 to $50 per week. Only College in the world where these paying professions are taught successfully. Established 16 years. Endorsed by International Association of Photo-Engravers and Photographers' Association of Illinois. Terms easy; living inexpensive. Graduates placed in good positions. Write for catalogue, and specify course in which you are interested.

Illinois College of Photography or Bissell College of Photo-Engraving } 907 Wabash Ave. Effingham, Ill.

L. H. BISSELL, President

HIGGINS' PHOTO MOUNTER PASTE

The kind you are sure to use with continuous satisfaction

AT DEALERS GENERALLY

CHAS. M. HIGGINS & CO.

BRANCHES: CHICAGO LONDON

MANUFACTURERS 271 Ninth St., Brooklyn, N. Y.

"We never know how good a thing is until we see the Imitations."—Old Proverb.

HOW TRUE THIS IS OF PLATINOTYPE!

Don't sell Imitations. Make prints that will enable you to say to your customers: "These I am sure of; they are Platinotypes."

No other prints as fine in Quality—no other prints as Permanent.

Send for sample print Japine Sepia or Black.

WILLIS & CLEMENTS

Philadelphia Pennsylvania

Artura Enlargements

Enlargements made on Artura Carbon Black paper are the finest kind, having all the quality of good contact prints. We make them from any film or plate negative, guarantee the work, and return negatives promptly.

NOTE THE PRICES—8x10, 20c. each; 11x14, 40c. each and 14x17, 50c. each. Postpaid.

Bodine's French Pictorial Lens

For those soft, sketchy effects that make the prize winning pictures; landscape or portrait 3 Sizes, $3\frac{1}{4}$ x $4\frac{1}{4}$ to 5 x 7 Have a Speed of F-5 Price, $5.00

High Grade Developing and Printing for Amateurs. Supplies for Gum, Carbon and Kallitype Printing.

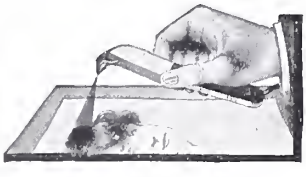
These and other new and interesting specialties described in our new catalog—a copy on request.

Photo Supply Dealers and Finishers. Send for our money making offer. Representatives wanted everywhere.

THE PHOTO CRAFTS SHOPS

Department B Racine, Wisconsin

We're doing business at the old stand making and selling the



Best Art Tool in the line for good work. Circulars free. Address:

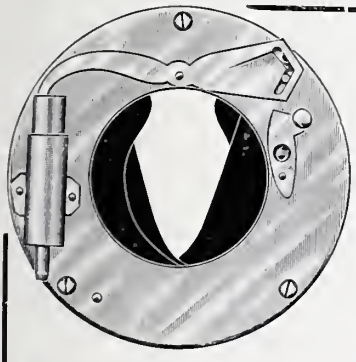
AIR BRUSH MFG. CO.

73 Nassau Street Rockford, Ill., U. S. A.

JUST compare a COOKE ANASTIGMAT LENS with any other make. Get one from your dealer, and screw it on your camera. Examine the needle-like definition at every point of the image, and notice that volume of light. Look at the three glasses without yellow cement, and with all surfaces available for cleaning. Examine, too, the mechanical construction of every part. Notice the flange-screw, and the exquisite finish, like that of a fine watch. You'll then understand the extraordinary success of Cooke Lenses. We make them in different series for different purposes, and fit them to all makes of shutters. Write for a catalogue with "Helps to Photographers."

THE TAYLOR-HOBSON Co

1135 BROADWAY
NEW YORK CITY



Price Only $6.00

Six Sizes
1½ in.
TO
2¾ in

Low View Shutter No. 10

We could not make it better for double the money as the mechanism is simplicity itself. No springs, toggle joints, or the like to get out of order. Sure in operation, either for time or instantaneous. Always dependable. No repair bills. Can be slipped off or on as required, having the Low adjustable back. Thousands in use by the discerning view photographers. Guaranteed bulb and tube supplied with each.

We make Shutters for every use. Write us for Folder C.

KALAMAZOO SHUTTER CO.
KALAMAZOO MICHIGAN

SATISFACTION AND SAVING
ARE SECURED BY USING
BINGO
GASLIGHT PAPER & POST CARDS
AND
BINGHAM DEVELOPERS
WRITE FOR BOOKLET
BINGHAM COMPANY
BINGHAMTON, N. Y.
(THE PHOTO CITY)

SPECIAL

¶**Photographers** wanting to save themselves useless effort in moving around studio furniture, should send for **Free Sample** Gnomo Castor; invisible, noiseless, easily attached and cheap. You will equip your chairs and tables with them after testing one.
¶Have you used **Handihooks** for picture displays, attachable anywhere? **Sample free.**
¶We have some new bargains in high grade lenses just now which we will be glad to quote you.

O. H. PECK COMPANY
116 S. 5th Street Minneapolis, Minn.
A REAL PHOTO SUPPLY HOUSE

AMERICAN PHOTOGRAPHY

AND

The Complete Self-Instructing Library of Practical Photography

an ideal combination for every one interested in the Art of Photography, either as a profession or for pleasure.

We want you to become acquainted with American Photography.

We feel sure that having once come to know American Photography you will wish to renew your subscription year after year.

Magazines and newspapers spend hundreds of thousands of dollars yearly in advertising to increase circulation.

We propose to increase our circulation by giving our subscribers the leading magazine of Photography and allied Arts of this country, and one that is the peer of any Photographic publication in the world; a magazine for those interested in Photography in any and all of its branches, for both amateur and professional photographers; a magazine of Art, and for lovers of Art and the beautiful.

WE ARE FOR "PHOTOGRAPHY" AND ITS ADVANCEMENT.

We know that there is in any language of all the world only one complete treatise and Encyclopedia of Photography, self-instructive, and teaching each and every branch of the Art; one that opens the door of knowledge to every department of Photography, gives all practical formulae; difficulties likely to be encountered; preventatives and remedies, all indexed for ready reference, and written simply yet authoritatively, so that anyone who can read English can understand it.

We have 5,000 sets of this invaluable book, "The Complete Self-Instructing Library of Practical Photography," an entire edition. By taking the whole edition we secured the books at the lowest possible price. We are going to turn over to subscribers to American Photography single sets of the Library at the price we paid. We make no profit on the books. We get the subscription to American Photography for one year, and know we will receive renewals for the years following.

THE LIBRARY IS DOWN TO DATE.

American Photography might almost have been designed as a monthly supplement to the Library, so perfectly does it perform that office, by telling of the new inventions and discoveries that depend on the principles the Library has made clear.

THE COMBINATION IS PERFECT.

The 5,000 sets of the Library will go rapidly. Act to-day and send in coupon on opposite page. If inconvenient for you to pay cash for Library we will arrange to carry your account for you.

We will POSITIVELY refuse to accept any order for the "Complete Self-Instructing Library of Practical Photography" unless same is accompanied by a year's subscription to American Photography, or is from one who is already a subscriber.

AMERICAN PHOTOGRAPHY

1305 Beacon Building

BOSTON, MASS., U. S. A.

ANNOUNCEMENT

Of Extraordinary Interest to YOU

The publishers of AMERICAN PHOTOGRAPHY have contracted for an edition of 5000 sets of

The Complete Self-Instructing Library of Practical Photography,

the acknowledged standard on the Art of Photography in all its branches, for the benefit of subscribers to

AMERICAN PHOTOGRAPHY

and to each subscriber will be extended the privilege of securing a single set of this Library, which everyone interested in Photography will have to have sooner or later, at the same net wholesale price paid by the publishers of AMERICAN PHOTOGRAPHY for such set in a lot of 5000.

AN UNUSUAL OPPORTUNITY, A TREMENDOUS SAVING

for those who are or who become subscribers to AMERICAN PHOTOGRAPHY, the Progressive Photographic Monthly, "representing all that its name implies."

The first edition of the COMPLETE SELF-INSTRUCTING LIBRARY OF PRACTICAL PHOTOGRAPHY was in eight volumes; completed in May, 1909. So great was the demand for the books that the whole edition was sold out in five months.

The entire second edition which has been secured by American Photography is now ready for delivery. This edition of the Library having been revised, added to and brought down to 1910 is in ten uniform volumes of about 400 pages each.

Vol. I. Elementary Photography
Vol. II. Negative Developing.
After Manipulation.
Wet Plates.
Ferrotypes.
Vol. III. General Exterior Photography.
Composition.
Vol. IV. Photographic Printing (Part 1.)
Vol. V. Photographic Printing (Part 2.)
Copying. Enlarging.
Lantern Slides.
Vol. VI. At Home Portraiture.
Flashlight.
Interiors.
Lenses.
Vol. VII. Studio Portraiture. (Part 1.)
Vol. VIII. Studio Portraiture. (Part 2.)
Studio System.
Color Photography.
Vol. IX. Commercial Photography.
Press Photography.
Scientific Photography
Vol. X. Negative Retouching.
Etching and Modeling.
Encyclopedic Index.
Glossary.

IT IS PRACTICAL; It covers both theory and practice; it tells the "why" as well as the "how."

Fill out, mail coupon today: we will send you particulars regarding the greatest opportunity ever offered those interested in Photography. ¶Through AMERICAN PHOTOGRAPHY is the only way you can secure the Library in single sets at wholesale prices.

AMERICAN PHOTOGRAPHY

1305 Beacon Building,
BOSTON, MASS.,
U. S. A.

CUT OFF ALONG THIS LINE.

Am. Photog.
1305 BEACON BLDG.,
BOSTON, MASS.

Please send without cost to me a simple copy of American Photography, also matter describing the Complete Self-Instructing Library of Practical Photography. Booklet containing nearly 1,000 opinions of the Library from first edition subscribers, together with full information regarding your special wholesale offer, price, terms, etc.

*Name*_____

*Street and No.*_____

*City*_____ *State*_____

RODENSTOCK'S DOUBLE ANASTIGMAT "EURYNAR"

GUARANTEE: Satisfaction or your money refunded.

A German Anastigmat, ground, centered and mounted in Germany. **Not a Substitute,** ground in America by German formula, to avoid import duty at expense of quality.

Rodenstock's "Eurynar" is a German product underselling all competitors 40 to 50 per cent, and is guaranteed as handsome and as efficient as the highest priced **substitute** for **German manufacture** or American lens on the market.

Order through your dealer or direct.

PRICE LIST "EURYNAR"

Series	No.	Focus	Aperture	Size of Plate at Full Opening	Size of Plate with Medium Stop	Price
Series (1) F. 6.8	0	4¾	F. 6.8	3¼x4¼	3½x5½	$ 19 00
	1	5¼	F. 6.8	3½x4¾	5¼x7	20 00
	2	6½	F. 6.8	4x5¾	6x8¼	22 00
	3	7.10	F. 6.8	5x7	7x9	29 00
	4	9½	F. 6.8	7½x9½	9½x11	37 00
	5	11¾	F. 6.8	9½x11½	11x13	56 00
	6	16	F. 6.8	11¾x14	14x16	89 00
Series (3) F. 5.4	1	5¼	F. 5.4	4x5	4½x5½	31 00
	2	6½	F. 5.4	4¼x5¾	6x8¼	34 00
	3	7	F. 5.4	5x7	7x9	39 00
	4	9½	F. 5.4	7½x9½	9½x11½	51 00
Series (4) F. 4.5	1	6	F. 4.5	3½x4½	5x7	35 00
	2	7	F. 4.5	4x6	6x8	43 00
	3	8¼	F. 4.5	5x7	7x9	47 50
	4	9½	F. 4.5	6½x8½	8¼x10¼	64 00
	* 5	11¾	F. 4.5	7½x9½	9½x11½	110 00
	6	14	F. 4.5	9½x11¾	11¾x14	130 00
	7	18¾	F. 4.5	11¾x15¾	17¾x19	188 00

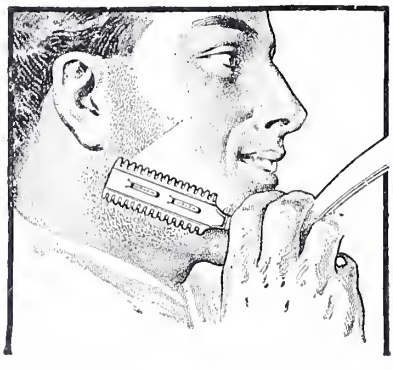
* No. 5 in Series 4 covers an 8x10 plate at full opening.

SOLE AMERICAN AGENTS

JAS. FRANK & SON Broad Street, Augusta, Georgia

DURHAM DUPLEX RAZOR

NOT A SCRAPER LIKE HOE-SHAPED "SAFETIES"



NOT DANGEROUS LIKE OPEN-BLADE RAZORS

"THE SAFE SAFETY"

is a perfect shaving device that *every* man can shave with, combining the correct Sliding Diagonal Stroke with Safety-Guard and Interchangeable Blades. Complete silver-plated set consisting of Razor, Stropping Attachment and six double-edged, hollow-ground blades of finest tempered steel; in kit or in handsome leather-covered case, $5.00. Other sets up to $8.00. Extra blades, six for 50c.

Illustrated Booklet Free on Request *Shave With a Smile—30 Days Free Trial*

THAT MAN PITTS

771 Market Street
1123 Fillmore Street
San Francisco, Calif.

GREAT DEVELOPING POWER AND CONCENTRATION

TRADE MARK **'TABLOID'** BRAND

TRADE **'RYTOL'** MARK

UNIVERSAL DEVELOPER

Produces ideal negatives, prints, enlargements and lantern slides with the greatest certainty and least trouble.

No waste; no fog; no stain; keeps perfectly.

Contents of Carton yield **88** oz. **35** cents All Dealers

More than sufficient to develop 5 doz. 5×4 plates. Note compactness of 'Rytol

SPECIMEN FREE

Send 2 cents to cover postage

BURROUGHS WELLCOME & CO.

Dept P., 35, 37 & 39, West Thirty-third Street, NEW YORK CITY

LONDON (ENG.) MONTREAL SYDNEY CAPE TOWN MILAN SHANGHAI

PHO. 433

ALL RIGHTS RESERVED

Send Us the names of your friends interested in photography. We want to send them a sample copy of :: :: :: :: :: ::

713-715 CALL BLDG.
SAN FRANCISCO, CAL.

Camera Craft

¶Do you know that all the "big men" are using one or more air brushes in their studios?

¶Do you realize just how little skill is necessary to use the new Wold Air Brush?

¶Do you appreciate the fact that you can give your pictures that superiority you want if you have an air brush always ready to do the work?

¶Send for booklet showing different styles. Agents in all parts of the world. **Carried in stock by Geo. Russell Reed, 645 Battery St., San Francisco.**

For Sale by
Sanborn, Vail & Co., Portland
Hirsch & Kaiser, San Francisco
R. A. Leet & Co., Oakland
Rabjohn & Morcom, Oakland

O. C. WOLD

716-724 W. Madison Street
Chicago Illinois, U.S.A.

BY DAYLIGHT AND ALL RAIL

TO

Yosemite Valley via Southern Pacific

By way of Merced in connection
with the Yosemite Valley R. R.

Only ten hours ride to El Portal (the edge of the Valley) and three-and-one-half hours thence to the Heart of the Valley

Low side trip rates to Wawona and
the Mariposa grove of gigantic trees

Leave San Francisco daily 8:20 a. m.

Ask any of our agents for details or write Chas. S. Fee, Passenger Traffic Manager SOUTHERN PACIFIC COMPANY, San Francisco, for beautiful illustrated descriptive literature.

TO PHOTOGRAPHERS

¶If you want a developer that improves your negatives fully fifty per cent, one that is fogless and non-staining, one that will give your negatives a quality they do not now have, one that brings out all the delicate detail without blocking up the high lights. One that is economical, because it can be used over and over without losing its developing power. One that is not subject to climatic conditions:—

USE EROGEN

This developer has wonderful latitude, is non-poisonous and will not stain the hands, plates or paper. Prices: 1 oz. 75 cts., ¼ lb. $2.75, ½ lb. $5.25, 1 lb. $10.00; sample free. Special discount to the trade.

A TRIAL OF LETOL FLASH POWDER

will convince you that it produces the smallest amount of smoke while at the same time it is the only powder that gives the true photographic violet light. Prices: 1 oz. 60 cts., ½ lb. $4.00, 1 lb. $7.50. Special discount to the trade.

¶We are agents for the Letol Specialties, Hayden's Film Tank, Crown Lenses, Seltona Paper, Barnet Super-Speed Plates.

Sole agents for the Celebrated Haloid Papers. Our stock is full and complete.

¶Our Eastern customers can secure Erogen and Letol Specialties of J. L. Lewis, 379 Sixth Ave., New York, our Eastern agents.

Our dark room is at your disposal for loading your holders or changing your plates.

Western Photo Supply Co.

Phone Kearny 1332 82 Third Street, San Francisco, Cal.

For prints *when* you want them, and *as* you want them, use

ARTURA IRIS

All Dealers.

ARTURA DIVISION,
EASTMAN KODAK CO.
ROCHESTER, N. Y.

Camera Craft

A PHOTOGRAPHIC MONTHLY

Entered at the Postoffice in San Francisco as Second-Class Matter.
Copyrighted, 1910, by Fayette J. Clute.

CONTENTS FOR JULY, 1910

Fruit and Nuts (Frontispiece).....Henry J. Comley
Color Photography on Paper as a Commercial Proposition.....
.....Henry J. Comley 261
What My Camera Has Done.....G. C. Flegel 267
The Successful Professional Photographer.....W. C. Dorn 271
Pictures Versus Records.....Roy J. Sawyer 277
Portraiture Under Disadvantages.....L. R. Godden 282
Editorials 285
Tenth Annual Pacific Northwest Convention—Mr. Thors Passes Away—The New England Convention—A Complete File.
A Photographic Digest..... 287
Time and Tank Development—Bromoil—Bromide and Increase of Contrast—Graduated Color Screens—Stereoscopy Without a Stereoscope—Seeing Stereoscopically Without a Stereoscope.
The Amateur and His Troubles..... 293
Sensitizing Carbon Tissue—Detecting Incorrect Exposure—Copper-Silver Intensifier—Printing on Silk—Autotype Carbon Tissue.
International Photographic Exchange..... 295
Club News and Notes 296
Notes and Comment 297

Subscriptions—Subscribers who do not receive Camera Craft promptly will confer a favor by notifying this office. The omission will be supplied and an investigation made. ¶ **Expirations**—Subscriptions to Camera Craft are discontinued on date of expiration. The date on the address label on the wrapper shows the time to which each subscriber has paid. Thus: Nov. 09, means that the subscription expires with the number dated November, 1909. ¶ **Renewing**—In renewing a subscription, do not fail to say that it is a renewal, giving name and address just as now on the address label. ¶ **New Address**—In notifying us of a change of address, give both the old and new address. Should you miss a copy through change of address, advise us of the fact, and another will be gladly sent. ¶ **Dealers**—All photographic supply dealers and news dealers are authorized to receipt for subscriptions in our name. ¶ **Names**—Subscribers, dealers and others will do us a great favor by sending in the names and addresses of those interested in photography, to the end that we may send them sample copies.

Subscription Price, $1.00. **Canada, $1.25.** **Foreign, $1.50.**

FOREIGN AGENTS:

Canada . . . . . United Photographic Stores, Ltd., Montreal
Mexico . . . . . Calpini y Cia., Mexico City
Philippine Islands . . . . . Squires, Bingham & Co., Manila
New Zealand . . . . . H. I. Jones & Co., Ltd., Wanganui
Australia . . . . . Baker & Rouse, Proprietary, Brisbane
. . . . . Harrington & Co., Ltd., Sydney
Japan . . . . . S. Kuwada & Sons, Osaka

THERE IS NO DENYING IT....

¶The photographer, be he amateur or professional, has enough troubles without having to worry about the quality or condition of the materials he uses. We make it our business to place at his disposal, at all times, only the best goods, and those in the best possible condition. Any lines at all likely to deteriorate are ordered in small lots with frequent shipments, thus making our stock always fresh and complete.

HIRSCH & KAISER

218 Post Street San Francisco

"ORANGES AND NUTS"
By H. J. COMLEY, F.R.P.S.
Reproduction of Direct
Photograph from Nature

Camera Craft

A PHOTOGRAPHIC MONTHLY

FAYETTE J. CLUTE, Editor and Proprietor

CALL BUILDING, SAN FRANCISCO, CALIFORNIA

VOL. XVII. SAN FRANCISCO, CALIFORNIA, JULY, 1910. No. 7

Color Photography on Paper as a Commercial Proposition

By Henry J. Comley, F. R. P. S., Hon. Sec. of the Society of Color Photographers

Our frontispiece this month is a reproduction; rather, an attempt at reproducing one of Mr. Comley's examples of color photography. As explained in a note at the head of an article by the same author in our May issue, the original has won prizes in several exhibitions devoted to color photography and is conceded to be the best example so far produced. It must be understood that the reproduction fails entirely in giving the soft, almost glowing, quality of the original. We must also offer our apologies for the wrong spelling of Mr. Comley's name in our May issue, an error all the more regrettable on account of its being inexcusable in this case, the name being so well known. While Mr. Comley has not the time to consider correspondence from those only superficially interested in the subject, he has intimated that he would like to see color photography taken up by a few professional photographers of standing, in this country; and any of our readers may advise us if they are so interested and we will use our best efforts to either secure further details from him or put them in touch with Mr. Comley direct. Mr. Comley is himself a busy professional portrait photographer. We would have reproduced one of his color portraits, but the half-tone process, with its superimposing of printer's inks, does not lend itself to the reproduction of delicate gradations in flesh tints.

Color photography on a paper base can be made a source of considerable profit even in its present stage of development, and those who take the matter up intelligently now will be the men who will establish themselves as the experts of the future when the general demand for this class of photograph comes along, as it inevitably will; though I believe the demand must be created and encouraged by the photographer himself. I certainly feel that professionals are neglecting a highly lucrative section of their business in not bringing this work forward, and that their apathy is a bar to progress in this direction.

It may be argued that the color studio opened in London a few years ago turned out a failure; but good reasons can be assigned for that unfortunate result. It was certainly not color photography which was at fault. Speaking personally, the writer makes color photography pay, and has been doing so for several years; so there is no earthly reason why others should not do the same. Successful results are not easy to obtain in any process of color work on paper, neither can prints be produced with anything like the facility that is possible with the ordinary monochrome processes; but is not this a good reason why it should be exploited today rather than wait until

a simplified process may be invented; a very remote contingency; and when it does come, the merest tyro with little or no experience may immediately enter into competition with us in the work.

Here is the opportunity for doing good business at high prices, business which can be done right alongside of your ordinary studio work without seriously interfering with present arrangements, and the first color-picture order you deliver will be the best advertisement your gallery ever had.

The first consideration is the necessary special apparatus. Three-color work can be quite well done with an ordinary camera and plate-holders, particularly such work as copying paintings, also for landscape and still-life studies; but for portraiture or any serious work in this direction a special repeating back should be adapted to a suitable rigid form of camera, with one plate-holder to carry three plates side by side, and a frame to take the three-color light filters. This form of camera-back is put on the market by Sanger Shepherd, Ltd., of London, but it can readily be made locally by any good cabinet maker.

For portraiture a modern quick-acting lens of large working aperture is indispensable in order that the combined exposure shall be as short as possible. With these requisites, together with panchromatic plates such as "Wrattens," three-exposure portraits can be made in the studio in ten to twelve seconds, and in four to seven seconds out in the open.

Cameras have been devised, and are obtainable, in which the three plates are exposed simultaneously. Theoretically, this form of apparatus should fill the entire requirements of the color worker, but unfortunately, there are drawbacks to its use. The most serious of these is that a set of light filters cannot be made which will automatically adapt themselves to various conditions of the light, even of one day, much less of a year. Light is a phenomenon exhibiting infinite variety, so that an all-embracing set of three absorption filters cannot be made which will work with present-day dry-plates for a fixed ratio of exposure. For instance, the mid-day light in spring and summer is highly charged with blue rays; as the day advances, the blue gives way to rays which are orange and increasingly red towards sunset. In the autumn and winter, particularly in England, the morning light is often more or less yellow, and there are always more orange rays throughout the day than there are in the summer light. Therefore, in order to work successfully under these varying conditions, at least three cameras of this one-exposure variety would be necessary, the light filters of each being prepared with different scales of absorption. A further objection is that one of the negatives is reversed as regards right and left, so that a copy negative must be made from it, with natural loss of quality. As an alternative, the plate may be reversed in the plate-holder, but this involves difficulty in making the set of negatives of equal ratio as color records, and often spells failure in the resulting print. But, in spite of these objections to a one-exposure form of apparatus, several members of the Society of Color Photographers are using them with a fair amount of success. The one outstanding advantage given by these cameras is that a slight movement of a figure or foliage is recorded upon all three plates, and the resulting print

What My Camera Has Done

By G. C. Flegel, I. P. A. 1718

Illustrated by the Author

THE TREE BY THE WAYSIDE.

TITLES must be short. Do not imagine, gentle reader, that I shall take the one used above as an excuse to inflict upon you a list of my own achievements as an expert photographer. My camera has been a great source of pleasure and satisfaction to me without having produced anything that could be called artistic; and I have felt indebted to it for a large amount of enjoyment and profit without in the least crediting any part of either to my artistic appreciation or the artistic quality of the results. Just why some writers on the subject should use the term, "merely a record," as if it conveyed the idea of all that was undesirable in a photograph, I cannot see. I have aimed to make "records" only, and in making them have found pleasure, and pleasure entirely free from any regret that the artistic element was often entirely absent.

Some three or four years ago I bought a camera, mainly because it was cheap, but partially for the reason that it appeared to me, from what the seller had to say, that about all I had to do was to sling the box over my shoulder when I started out and return home with a collection of plates from which I could print any number of as up-to-date pictures as it was possible to get. And I did get them. Gee! what a lot they were; in fact, I had everything from an under-exposed negative that was almost clear glass to one that was so badly over-exposed that I could not see daylight through it. I had everything from a plate that had not been exposed to one that seemed as if I had tried to make the most composite ever; in fact, I had four exposures on that plate, ranging from a single figure to a landscape. As I was not entirely broke, either in spirit or financially, I tried again. It is my disposition to go after a thing more than once if I don't happen to get

it the first time; so I made another try at it a short time after the first effort; and, on my return, had a few negatives from which I could print pictures.

These two experiences convinced me of two things: first, that there was considerably more in it than going out in the country and pressing the button; and second, that I would be considerably older than I am at this writing, even before I became the possessor of a print of my own production that would elicit favorable comment by my friends, if I depended entirely upon my own efforts. I therefore made it a practice to read everything photographic that seemed of a practical nature, particularly such articles as appealed to the amateur. It was not long before I found myself deriving great benefit from my reading, so I subscribed for the best photographic magazines, and have continued to find them worth many times their cost. At the end of a year I found the camera had done little more for me than point out a way in which I could blow in all the spare cash I had, and in some instances cash that I could not so very well spare. During this period, the maxim, "Experience is a dear teacher," was brought most forcibly to my mind a number of times.

ON THE SANDUSKY RIVER. WHEN FROST IS KING.

After trying nearly every developer that was compounded by formula given in the magazines and books, some of which, to my mind, were never intended to be compounded at all, formula or no formula, I decided that there were a lot of people writing on the subject just simply for the love of writing something. I discarded them all and started in to use only one developer, one that had given me some good results, and I have continued to stick to that old reliable closer than a tick to a dog's back. I am still getting results; but I never could tell just when to stop development; that was my weakness. I always seemed to over or under develop; not so awful much, but just enough to make printing a good deal of a trial. Just to get away from this defect, I bought a tank; and that fixed things exactly. Say, fellows, the tank is surely the correct thing, no more uncertainty; and, if a plate is a little over or under timed, I get all there is in it without any guesswork. And that was where this camera of mine commenced to do things for me.

Looking back over my experience, I can see that my camera has done a great deal for me in many ways. In a financial way it has repaid the

original investment in full, besides having paid the expenses of many of my pleasure trips. That alone is no small item when it is remembered that I do not follow photography as a means of gain. The camera's productions have been the best possible chronological register of events, such as I could have had under no other conditions. Looking over the prints, I find, from their dates, the dates of storms, special happenings, social gatherings, and things of that kind; the pictures themselves being practically an account of the most interesting of the happenings in my small world, my vacations to various parts of the country. In fact, my camera has provided me with indelible records of many pleasurable events during the past few years. The prints reproduced herewith are from negatives that I would not part with for a good deal more than they are worth to any one except myself. They certainly are not great productions, from an artistic point of view; yet they suit me, and suit me exactly. They tell me true stories, vivid stories, complete stories; stories of sunshine and pleasures, stories of storms and hardships.

IN THE PARK. SEPTEMBER.

And I am not going to try to tell their stories for them; it is unnecessary; they can tell them much better themselves. From the Cascades of Oregon to the rivers of Ohio, there is a story in each. My camera has given me these in a form to which I can turn as the spirit moves; and, as I turn the pages of my album, I revisit the scenes, enjoy again the pleasures, once again conquer the buffeting of the storm. Could I gain a fractional part of this enjoyment by an endless striving to measure the results of my puny capabilities as an artist against the work of the masters of artistic photography?

And more, my camera has brought me nearer to nature than I ever expected to get; it has taught me to see the beauty in that which I have hitherto passed by without notice; it has taught me that there were other things in life besides the daily grind; in fact, it has made that same daily grind less objectionable by the diversion which it introduced. It is a recreation, a re-creation, for me, at least, to take a few hours with my camera, away into the country. Be it hill, marsh, field, or woodland, from every point I can find something to attract, something to admire. The flowers, the waving grain, the gentle sweep of the valley, the rugged sternness of

THE MILL RACE.

the mountain, the purling brook, the dashing torrent,—all have their charm; and my camera records it all for me.

I am quite sure that my good friend, my camera, will never make enough of an artist out of me to secure my co-operation in the production of the "fuzzy artistic" kind, such as are affected by some who occupy high positions in the photographic world. I fear I am entirely too matter-of-fact for that peculiar faculty of appreciation of the indistinct to obtain in my make-up. But my camera has made enough of an artist of me to enable the reproduction of scenes, records if you will, of many enjoyable hours of travel and tramping during the past four years. Not only this, but others have enjoyed the prints it has permitted me to obtain. More, its productions, through the post card division of the I. P. A., have enabled me to extend my acquaintanceship to other parts of our own country and to other lands; and many of these become friendships that are enjoyable and lasting.

Light and Shade

In nature we can put our hands into the shades, but we put them upon the lights.

Nature puts on the lights, and leaves the shades, whereas with crayon or pencil we put on the shades and leave the lights (i. e., the white paper).

Without shade, the white paper is not light, wanting the contrast of shade which alone can make it appear luminous and attractive.

In a drawing, the outline is to the contour of a real figure or body just what the light and shade are to the surface; the one leaves an object superficial, the other makes it appear solid.

The moment light and shade are introduced, the outline should cease to exist as an outline—it is no longer required.

Nature takes so much pains to conceal a distinct outline.—J. D. Harding.

The Successful Professional Photographer

By W. C. Dorn

Our Prize Article for July, Winning a Wold Air Brush

We know that some men succeed as professional photographers, and that others fail. We realize that this must be so, just as it is in every other sphere of human endeavor. We appreciate the fact that photography as a business, or as a craft, if you will, necessitates comparatively little training, and for that reason is liable to be overburdened with mediocre practitioners, conducing still further to a high percentage of failures. These things we know; but can we state absolutely and definitely just why one man succeeds and another fails? Can we give a rule that will assure success? Can we lay a course that will avoid the rocks of failure, one that will prove a true chart in every sea? I believe that this can be done.

Many a scientific theory is but a guess founded upon a mass of known facts; details that, in themselves, have but little value. To evolve a sound theory as to what insures success in professional photography, we have but to employ the innumerable facts that are presented to us on every hand. We have but to study the successful men in other lines to find that there are numerous conditions conducive to success while numbers of others lead to failure. These are our facts, our details. We have but to catalogue the most obvious and our theory becomes more than a guess; it makes for a definite course that can hardly result otherwise than in success.

First and foremost, the photographer must be a business man. He need not fear that his standing as an artist will suffer thereby. In this age of commercialism, lack of businesslike methods is much more inimical to the esteem of one's neighbors than a lessened reputation for artistic ability could possibly be even in a photographer. The first essential to a good business system is a working bank account, however small. Never mind how small, for, as I heard a banker inform a timid customer the other day, the banks like their checks scattered over the country; it encourages others to do business with them. By paying all bills, and even supplying yourself with petty cash, by check, and banking all money received, the stubs of your check-book give an accurate account of all your transactions, and the returned checks are the best of receipts for money paid. Your dealer will unconsciously hold you in higher esteem and you will have the reputation of being businesslike in your dealings. You will find yourself less likely to incur needless expense. You will take pride in seeing your balance at the bank increase from year to year, if such be possible.

Have system about your buying. Avail yourself of cash discounts whenever possible. At the same time do not ride this hobby too far or too fast. Pyro may cost you twenty-five cents an ounce, and by so buying it you can pay cash and avail yourself of a small discount. On the other hand, laying in a pound at twenty or twenty-five dollars will save you a much larger per cent, even if you have to ask your dealer for sixty or ninety days.

If you can buy the larger amount and at the same time secure the cash discount by a prompt check, so much the better. But here again is another hobby that can be ridden too hard. The persuasive salesman knows full well the strong argument of large lots and special prices. Carloads of mounts have been sold that were never used. They went entirely out of fashion, fire destroyed them and the insurance company failed to recognize their special value, the photographer sold out and the name embossed in such bold and effective lettering did not appeal to his successor. Remember that you are buying the goods the salesman offers. Trust him to remember that he is selling you all that he can.

Have a businesslike method of handling all orders. A simple card or loose-leaf ledger system is not hard to devise. The nearest bookkeeper will be only too glad to give you the benefit of his special knowledge. He will feel flattered at an opportunity to talk over your requirements and make suggestions; doubly so if his suggestions are adopted. He will be delighted to start you well with the system to be used, and the cost will be surprisingly small. Go over these cards or ledger leaves at least once a month. Weed out all the closed up transactions and make an effort to collect all money due you on account. At stated intervals go over the closed accounts and send each party a neatly printed announcement that will tend to keep your name and your facilities before him. No matter how small your business, conduct it in a businesslike way and thus secure the esteem of the business men with whom you come in contact. It is not necessary that you pose as an artist pure and simple too persistently.

As businesslike methods will bring you more directly in touch with, and into closer scrutiny by, the business men of your community, your honesty, both in business and in social relations, must be above reproach. Be honest with your patrons; be honest with yourself. Avoid any suspicion of catch-penny methods in your dealings. There are, unfortunately, unscrupulous venders of questionable schemes, men who would disgrace the entire profession were there not so many of the honest and honorable type as to raise the general average to a high standard. A reputation for honesty and integrity is one of the best assets a photographer can possess. He has but to place this between himself and the mountebank and the gulf will be so wide that all danger of his being wrongly classed is at once removed.

The next most important qualification is health, both of body and mind. The man whose body is tortured by pain, be it ever so slight, is in no way fitted for success. A toothache, even a corn, may mean the loss of many dollars to the man whose success depends so greatly upon his personality, his treatment of his customers, as does that of the photographer. Good health is mainly a question of right living, work that interests, and play that revives and recoups after too close application. Here again the saner course will be to your advantage. Take an occasional day in the fields with a fishing rod or gun. Do not begrudge the cost of either. You will come in contact with and be esteemed by others who appreciate the value of the same sane form of recreation. Your outlook will expand and your capacity for good work increase. Stay constantly at your work, venturing

MISS M.
By JAMES DANIEL MILLER.

enment. Our patrons are not the victims of any such bias. While their tastes are often faulty, our greatest art lies in giving them what they desire. Study their taste, seek to lead it in the right direction if you will, but give them what they like. The poorest photographer in the land can turn out a certain class of work, can easily delude himself that it is what his customers should want,—and starve. The better craftsman is capable of appreciating the wants of his customers, producing what will satisfy their wants and please them. If he can add his own touch of individuality, well and good. If he can endow this same work with an artistic quality in advance of his customers' power of appreciation, so much the better.

Still another advantage that is possessed by the capable photographer is his power to offer his customers evidence that he keeps in touch with

all that is new. Perhaps one out of every ten of the "new styles" will be found acceptable to your customers. That granted, it pays handsomely to place the entire ten before them in rotation. All will add to your reputation as a progressive photographer and the tenth will add directly to your income. Give your customers an opportunity of passing judgment upon such things at your own studio. Do not wait for them to find something that pleases their taste in the window of your competitor in the next town. Do not wait for your customer to bring you a portrait of Cousin Tom from the large city and ask you if you can make the same class of work. Show the new work in your own cases at the earliest possible moment. The cost will not be large, but the advantages will be great.

I had intended to say a few words on the matter of advertising; but this paper is already too long, I fear. However, I believe that low postage and the efficiency of the mails give the wideawake business man, be his line what it may, an advantage that he is only beginning to realize. In the territory surrounding our smaller cities and towns, a piece of neatly printed advertising matter still has a great value; a value that it does not have with the residents of more commercial communities. I would therefore advise photographers to consider the possibilities of such publicity. A neatly printed folder, small and tasty, particularly if it contains an attractive picture, will be given attention, and the photographer will profit accordingly. A neat card should be carried regularly in his local paper and, if the photographer feels that he can give the time and the requisite knowledge of the subject to the production of constantly changing catchy announcements, so much the better. This, however, is a subject in itself, and all I can do is to warn him that the line between a catchy announcement and buffoonery is not always realized until too late.

FISHING IS SUCH FUN. By NICK BRUEHL

Pictures versus Records

By Roy J. Sawyer

This article is given room for the same reason that space was allowed Mr. Smallwood, a few months ago, in which to set forth his views. There seems, however, a tendency to disregard the important fact that different subjects require different treatment. Flowers and some still life subjects can hardly be effective except with the most minute detail. Genre studies, even those by the acknowledged masters, are often full of fine detail throughout. The landscape work of the late A. Horsley Hinton could hardly be classed as unsharp, and yet he was a master in the portrayal of nature's moods. On the other hand, some of the most pleasing examples of pictorial photography in late years have been of such a character that they could be viewed only from a distance. And, just as one person likes rag-time and another grand opera, there will always be a difference of opinion as to what is pleasing in a picture. Articles such as the one herewith can only assist the reader in determining his line of procedure. We must each work out our photographic salvation in our own way.

There was an article published in "Camera Craft" some months ago, obviously written by one belonging to the "old school" of photography—that is to say, the class that photographed nature, regardless of her mood, and conventional street scenes and buildings, all in the same manner. They are content to produce a microscopically sharp negative, entirely lacking in individuality based on the aspect of the scene at the time, merely carrying out the idea of the fledgeling amateur who delights in extremely sharp negatives and their resultant wealth of detail in the print. True, the "old school" worker has learned the knack of filling the plate to better advantage, and his experience and technical knowledge make the matter of exposure and development more uniform and certain; but that is the only difference. Occasionally, the arrangement of line, possibly of mass as well, will give him a decorative effect; but the same thing will often happen in random snapshot work.

I well remember my own first attempts, and how proudly I would show the pictures of my home and its surroundings, with each brick clear and distinct, even the bark on the trees being full of detail, and demonstrating beyond a doubt the value of U. S. 64 in producing extreme detail. However, after enjoying nearly a half score of years (photographic ones), and entertaining in that time an equal number of different ideas as to what constituted a picture, I have arrived at the following conclusions: A print must belong to either the pictorial or record of fact class. If a photographic print succeeds in its mission of impressing upon the beholder's mind the effect intended, it can, at least, be set apart from the one that is merely an exact reproduction of the scene photographed without a trace of individuality either in conception or treatment.

We are moved by music because of the impression it conveys; and, as music pleases the ear on account of its power to create an impression, so does a print please the eye if it contains the essential elements necessary to create the impression intended. The paintings of the great masters are pleasing to the eye because the mind finds pleasure in the effect which the picture, taken as a whole, conveys. The eye of the artist, in its mission of finding the pictorial in nature, conveys to his mind the impression of the scene, taken as a whole, entirely ignoring the detail in

all that is new. Perhaps one out of every ten of the "new styles" will be found acceptable to your customers. That granted, it pays handsomely to place the entire ten before them in rotation. All will add to your reputation as a progressive photographer and the tenth will add directly to your income. Give your customers an opportunity of passing judgment upon such things at your own studio. Do not wait for them to find something that pleases their taste in the window of your competitor in the next town. Do not wait for your customer to bring you a portrait of Cousin Tom from the large city and ask you if you can make the same class of work. Show the new work in your own cases at the earliest possible moment. The cost will not be large, but the advantages will be great.

I had intended to say a few words on the matter of advertising; but this paper is already too long, I fear. However, I believe that low postage and the efficiency of the mails give the wideawake business man, be his line what it may, an advantage that he is only beginning to realize. In the territory surrounding our smaller cities and towns, a piece of neatly printed advertising matter still has a great value; a value that it does not have with the residents of more commercial communities. I would therefore advise photographers to consider the possibilities of such publicity. A neatly printed folder, small and tasty, particularly if it contains an attractive picture, will be given attention, and the photographer will profit accordingly. A neat card should be carried regularly in his local paper and, if the photographer feels that he can give the time and the requisite knowledge of the subject to the production of constantly changing catchy announcements, so much the better. This, however, is a subject in itself, and all I can do is to warn him that the line between a catchy announcement and buffoonery is not always realized until too late.

FISHING IS SUCH FUN. By NICK BRUEHL

Pictures versus Records

By Roy J. Sawyer

This article is given room for the same reason that space was allowed Mr. Smallwood, a few months ago, in which to set forth his views. There seems, however, a tendency to disregard the important fact that different subjects require different treatment. Flowers and some still life subjects can hardly be effective except with the most minute detail. Genre studies, even those by the acknowledged masters, are often full of fine detail throughout. The landscape work of the late A. Horsley Hinton could hardly be classed as unsharp, and yet he was a master in the portrayal of nature's moods. On the other hand, some of the most pleasing examples of pictorial photography in late years have been of such a character that they could be viewed only from a distance. And, just as one person likes rag-time and another grand opera, there will always be a difference of opinion as to what is pleasing in a picture. Articles such as the one herewith can only assist the reader in determining his line of procedure. We must each work out our photographic salvation in our own way.

There was an article published in "Camera Craft" some months ago, obviously written by one belonging to the "old school" of photography—that is to say, the class that photographed nature, regardless of her mood, and conventional street scenes and buildings, all in the same manner. They are content to produce a microscopically sharp negative, entirely lacking in individuality based on the aspect of the scene at the time, merely carrying out the idea of the fledgeling amateur who delights in extremely sharp negatives and their resultant wealth of detail in the print. True, the "old school" worker has learned the knack of filling the plate to better advantage, and his experience and technical knowledge make the matter of exposure and development more uniform and certain; but that is the only difference. Occasionally, the arrangement of line, possibly of mass as well, will give him a decorative effect; but the same thing will often happen in random snapshot work.

I well remember my own first attempts, and how proudly I would show the pictures of my home and its surroundings, with each brick clear and distinct, even the bark on the trees being full of detail, and demonstrating beyond a doubt the value of U. S. 64 in producing extreme detail. However, after enjoying nearly a half score of years (photographic ones), and entertaining in that time an equal number of different ideas as to what constituted a picture, I have arrived at the following conclusions: A print must belong to either the pictorial or record of fact class. If a photographic print succeeds in its mission of impressing upon the beholder's mind the effect intended, it can, at least, be set apart from the one that is merely an exact reproduction of the scene photographed without a trace of individuality either in conception or treatment.

We are moved by music because of the impression it conveys; and, as music pleases the ear on account of its power to create an impression, so does a print please the eye if it contains the essential elements necessary to create the impression intended. The paintings of the great masters are pleasing to the eye because the mind finds pleasure in the effect which the picture, taken as a whole, conveys. The eye of the artist, in its mission of finding the pictorial in nature, conveys to his mind the impression of the scene, taken as a whole, entirely ignoring the detail in

QUIETUDE.

the bark of the trees and the number of grass blades in any certain part of the view. These details, playing no part in the general effect which inspired the selection, are not required in the picture intended to convey the effect or impression in turn to the beholder of the print.

If a certain "bit" of nature appeals to one as being worthy of being recorded, should it not occur to the mind that there is a reason for its so doing? Perhaps the old, winding road, with the willows at the side, viewed in the peaceful calm of an evening light, suggests, "The Close of Day." Possibly the misty river with an old skiff in the foreground and the dim outline of trees on the further shore, enshrouded in haze, brings to the mind the effect of "Early Morn." These are only examples of Nature's varied moods, all of them beautiful, if one will but cultivate an appreciation of our great Instructor's countenance.

It matters not by what means the effect one is striving for is produced, as long as legitimate bounds are recognized and there is an avoidance of the bizarre and sensational; as, to my mind, a print that represents only a certain amount of black and white distributed over a given surface, apparently without motive, is to be abhorred. One should have a definite purpose in mind for each picture made, and not endeavor to produce a certain effect in a certain way, because someone else has produced a successful picture by those means. I once photographed a certain pretty bit of nature in an endeavor to reproduce an evening effect; but the resultant print showed so much detail that the effect was spoiled. The insistent detail destroyed the impression it would have been capable of conveying had it been suppressed. As the scene appealed to me, I tried again, using full opening of the lens and slightly diffusing the entire focus;

THE FOOTPATH IN WINTER.
By ROY J. SAWYER

with the result that the picture not only satisfied my own requirement in no small degree, but it passed muster in the eyes of a salon jury. I do not at all claim to be an expert in judging pictorial work, but I do know that certain pictures gratify the eye through the favorable impression created upon the mind, solely because they convey the effect that their makers sought to secure.

I would not have it thought, however, that, in order to be artistic, every trace of detail should be eliminated from the picture; for, in numerous cases, detail in the foreground is essential. In combination with a soft, atmospheric distance, a well-defined foreground is necessary for the rendition of certain effects. In a snow scene, for example, the texture of the snow with its detail and gradation in the shadows, particularly in the foreground, is observed and appreciated by the eye when viewing the scene; and this quality should be preserved in the pictures. Only the distance, which is not taken into account as to texture, should be softened. The effect of the scene upon the mind should determine the treatment. And it is only by asking ourselves what produces the effect that we can determine what to emphasize and what to subdue in our picture. Even should the result of our efforts not meet with the approval of a salon jury, one can at least feel that there is some originality shown, some of his own individuality displayed.

I must not forget to mention that there is one class of subjects that, in my judgment, should always be photographed with all detail possible, and that is flowers. In viewing them, the eye always finds pleasure in their form and texture, as well as in their coloring, which last is denied us in ordinary photography. For that reason, diffusion of focus, except as to backgrounds, should be avoided in flower studies. We must remember that the camera is but a mere machine to be used as a means of producing results, results more or less satisfactory according to the skill of the operator. To merely photograph a scene as it appears upon the ground glass after being sharply focused, stamps the photographer as being but a mere machine as well.

When the average amateur passes through the embryo stage, when houses, street scenes, and moving locomotives become a "drug on the market," his album of prints palls; he realizes that it contains the same identical kind of work that an intelligent child of twelve can produce. It is then that he will naturally look for something higher, something that will lift his work from out the rut of the ordinary snapshot fiend to that plane occupied by the pictorial worker. That is, if he be one of those amateurs who have a real interest in photography, who realize that the making of real pictures is the goal of their cherished ambitions for those who love their hobby enough to desire to progress. One print having pictorial quality is worth more than a hundred of the other kind. It is something that has a message to convey, something of which one does not tire.

It is not difficult to become an automaton, going through the few simple details necessary in order to secure on the plate an exact record

THE FRESH BROKEN ROAD. SUNLIGHT AND SHADOW.

of the scene as the lens sees it; but should not one strive to put some of his own individuality into his work, becoming, by so doing, one of the few, instead of remaining one of the many? Does your clear-cut house, street scene, or moving locomotive, with all its harshness and detail, appeal to you further than as an example of what your lens can do and your skill in timing and developing produce? Will these prints ever have more than passing interest? Will they, as years go by, remain in your album as pictures of which you may be proud? As records, possibly, they may some day have a value, just as an old newspaper file may have.

And these records are interesting, in their way. As a member of the International Photographic Association, I have made my share of them. I find that members like to have prints typical of the location in which one resides, records as it were; and, of course, detail is of first consideration in pictures of this kind. But these pictures can never occupy a place in my album as my cherished productions. I find that, while many amateurs remain mere recorders of dry facts, the foremost ones have graduated from excessive detail in their pictures to the broad, artistic effects, that are so pleasing to the appreciative eye. And, most significant of all, they never return to the starting point. Are **you** moving forward?

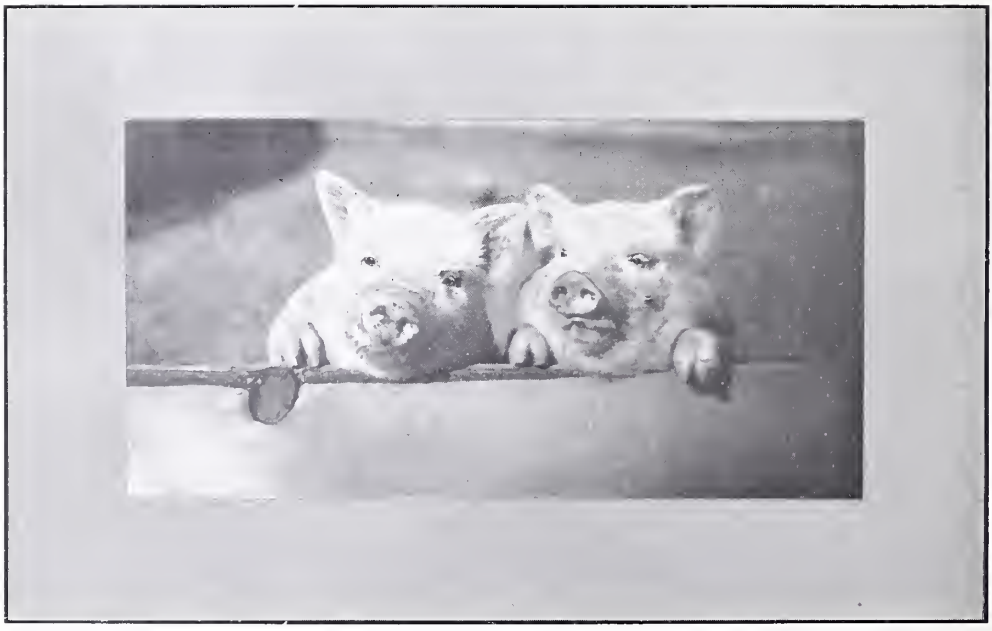
The few prints submitted with this article are not offered as examples of perfect composition; neither are they perfect as to execution; but they portray, fairly successfully, the several scenes and those qualities of the scenes that impressed me at the time of taking them.

Portraiture Under Disadvantages

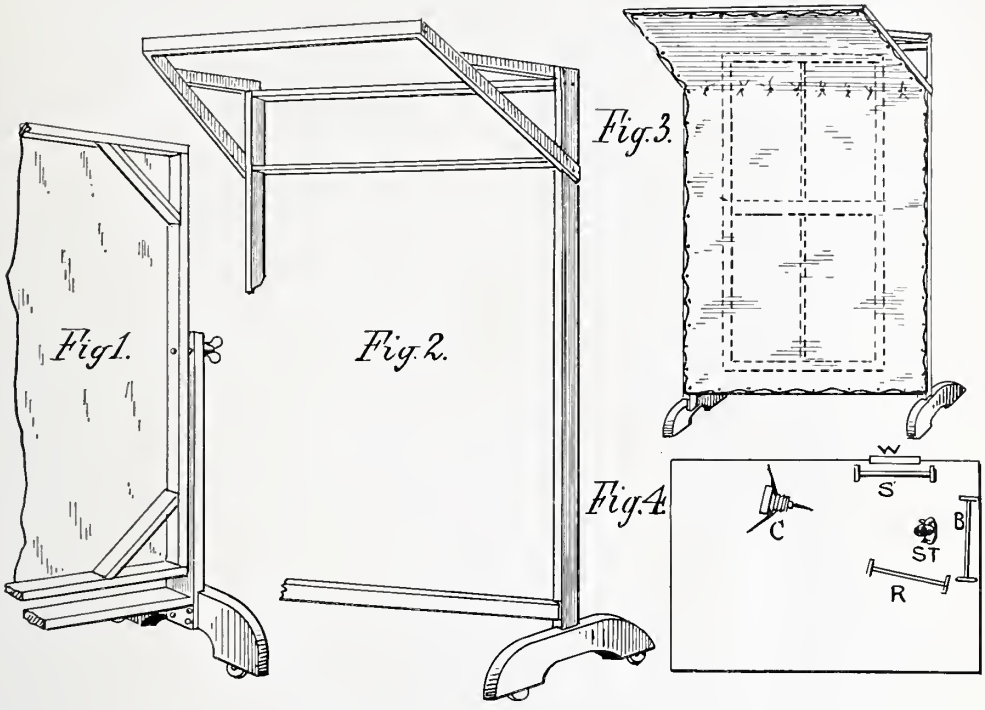
By L. R. Godden

Once upon a time, as all good stories should begin, and this poor one may be allowed to do, I found myself in a place where it was very desirable to embark in portrait photography in a small way; but, all the facilities thought to be necessary for this special line of work were wanting. There was no skylight available, and no backgrounds, reflectors, or screens obtainable without a delay that was out of the question. It may interest some of "Camera Craft" readers if I describe the means taken to overcome the difficulties. There may not be anything particularly new in the way I went about the work; but, as I have found the same home-made utilities so practical that they have been used many times since, even when the more showy articles of the shops were available, I will give an account of their construction.

I secured a room some eighteen feet long and with a north window about three feet from one end. There were other windows in the room and all of them were of the ordinary house variety, about three by six feet. All except the one mentioned were screened off with good opaque curtains that happened to be in place. I had to have a reflector to light up the shadow side of the face. This was made of good, generous size, about 5x7 feet, swinging horizontally as shown in the sketch of one side in Fig. 1. The frame proper is of one-inch stuff; the side pieces, 1x2, and the feet cut out of 2x6, planed down to about 1½x6. The screen being



INQUISITIVE PIGS, A STUDY IN MODERN PORTRAITURE. By PHIL A. FRIEDELL
Bright sun, outdoors, 3:30 P. M., March, 1/25 second, f-22, Hammer E. F. plate, Hall Reflecting Camera, one-fourth inch slit, Wollensak lens, full opening.



swung at the center, that part is about three feet from the floor. The framework was covered with stout paper pasted over cloth, and given two or three coats of clear white kalsomine. This made an excellent reflector, and with the swing in the center I found I could get the light wherever it was wanted.

But even with my big reflector, I discovered, as many another has probably done, that the light from my window was altogether too direct and concentrated. To obviate this I constructed a screen, one side of which is shown in Fig. 2, designed to be placed in front of the window as shown in Fig. 3. This, as can be seen by the sketches herewith, consists of a framework of wood covered with cheesecloth, the covering starting some few inches lower than the window sill, extending perpendicularly to within about ten inches of the top of the window, and from that point extending forward and upward at an angle, as shown, for a distance of two feet more. As shown, it was somewhat wider than the window. Tracing cloth is more desirable than cheesecloth, being more durable as well as more translucent. Of course, one might secure about the same results by tacking the cloth directly upon the window casing up to within eighteen inches of the top and carrying it from that point out overhead a few feet with wires, but I believe the screen gives a softer and more diffused light, better under control, with the added advantage that it can be easily removed to one side when a contrasty lighting is wanted, or short exposures are imperative, as for baby pictures. I might add that, when an extra

large or double window is the source of light, the screen has been found even more desirable. With such an arrangement every necessary lighting may be secured.

I was fortunate enough to have a fairly good ground with me, but occasions demanded a plain white and a gray ground, and a ground of larger size. And again the kalsomine came to my relief. I found that almost anything answers for the surface; cloth, paper, even a wide strip of burlap which had to be patched before the kalsomine was applied. An excellent white one, suitable for vignettes, was made by giving another old ground that I had, three or four coats of the white kalsomine, to which had been added a little blue, just enough to tint it slightly. This gave an excellent white in the print while avoiding the glare that a pure white surface would have had. The kalsomine comes in a variety of shades and colors, almost any of which can be used for grounds. The reddish browns give a good gray in the print; a dark green gives a gray of a somewhat different tone. The beauty of the stuff lies in the fact that it is easily prepared, can be applied with almost any brush that comes handy, and dries perfectly smooth; this last an advantage not possessed by other coloring media.

Figure 4 is introduced to show the arrangement of camera, screen, background, reflector and sitter, as used in the room mentioned. The blocking off of the lower part of the window with some opaque material can be done at the option of the photographer, although I have found it better to cut off the excess of light at that point by making the lower part of the screen opaque by means of some dark material.

Art—What Is It?

Ars est celare artem.—Ovid.

Ars longa, vita brevis.—Hippocrates.

Art is long and time is fleeting.—Longfellow.

Art is not the bread indeed, but it is the wine of life.—Jean Paul.

Art must anchor in nature, or it is the sport of every breath of folly.—Hazlitt.

Art is the work of man under the guidance and inspiration of a mightier power.—Hare.

Art rests on a kind of religious sense, on a deep, steadfast earnestness; and on this account it unites so readily with religion.—Goethe.

Nature is not at variance with art, nor art with nature; they being both the servants of his providence. Art is the perfection of nature. In brief, all things are artificial; for nature is the art of God.—Sir T. Brown.

To gild refined gold, to paint the lily,
To throw a perfume on the violet,
To smooth the ice, or add another hue
Unto the rainbow, . . .
Is wasteful and ridiculous excess.

—Shakespeare.

Camera Craft

A PHOTOGRAPHIC MONTHLY

VOL. XVII. SAN FRANCISCO, CALIFORNIA, JULY, 1910. No. 7

Tenth Annual Pacific Northwest Convention

Just too late for mention in our last issue came the program of the next convention, the tenth, of the Photographers' Association of the Pacific Northwest, to be held at Vancouver, British Columbia, August second, third, fourth, and fifth. It is going to be a rousing convention, because the Canadian delegation have long promised they would show the others what could be done when it came their turn to have the gathering in their territory. Vancouver needs no praise, and early August in that city is simply ideal. Pictures intended for exhibition should be sent to George T. Wadds, 338 Hastings Street, Vancouver, British Columbia. The address of the Secretary, W. G. Emery, is Vancouver, Washington. So there is no excuse for any photographer in Oregon, Washington, Idaho, Montana, or British Columbia, not finding out all about it in time to send a display, and follow it in person a few days later. It is to be the best convention this wide-awake association has ever held or the Canadian delegation will be sadly disappointed, and they are not in the habit of so being.

Mr. Thors Passes Away

Louis Thors, one of the oldest, best, and most highly esteemed of the local photographers, passed away, Saturday evening, June fourth, at a sanitarium in Oakland, to which he had been removed a few days before from his home in this city. Cancer of the stomach was the primary cause of his death. He was seventy-two years of age; and, except for an absence of about two years following the fire, during which period he operated a studio in St. Louis, Mr. Thors had been identified with the photographic business of this city for some forty years. Of French descent, Mr. Thors came to this country from Amsterdam, Holland; and his skill as a painter at once secured him employment with Bradley & Rulofsen, then the leading photographers on the Coast. His skill as a retoucher, an art which he rapidly acquired, decided his future; and his success with a studio of his own was most gratifying, despite the presence in the field of such masters of the camera as Tabor, Morse, and others. Mr. Thors was loved and respected by all who knew him, not only for his skill as a photographer, but for his charming personality, his unvarying courtesy, his high moral character, and his keen and cultivated mentality. His loss is one that is deeply felt by a host of friends, who valued most highly that warm friendship which he so freely gave in exchange for the friendship which he so universally compelled from those who came within his sphere of acquaintanceship.

The New England Convention

Under the able management of President W. F. Oliver, the Thirteenth Annual Convention of the Photographers' Association of New England, to be held in Boston, July twenty-sixth, twenty-seventh, twenty-eighth, and twenty-ninth, promises to be a record breaker for that enthusiastic Association. Mr. Oliver is sending out some very convincing announcements and announcements that do not deal in glittering generalities. Ryland W. Phillips, J. Hammer Croughton, and C. H. Claudy will talk on vital subjects, and they alone are worth going a long way to hear. Twenty-one prizes will be awarded, and a photographer who will not try to win one out of twenty-one prizes at a thirteenth convention ought to have a string of rabbits' feet tied around his neck. If you are a New England photographer, get into communication with President Oliver; his address is Baldwinsville, Massachusetts.

A Complete File

The California State Library is desirous of securing a complete file of "Camera Craft." Owing to the fire of 1906, we are not in a position to supply it, despite our desire to do so. Just after the fire, we asked our readers to favor us with back numbers that they could spare in order to give us a file, and several complete sets were offered us. These we did not care to accept, feeling that the owners valued them or they would not have gone to the trouble to keep the sets complete; making up our own file from the odd numbers which were offered. As we understand it, there is no provision made for the purchase of such back numbers of magazines by the librarian; but we are calling attention to the library's wants, feeling that perhaps this might reach the eye of someone in possession of a set that he would be willing, at this time, to put to so good a use. We can ourselves supply the issues published since the fire, and possibly, from our stock of back numbers, fill out one or two of the years immediately preceding that date—May, 1906. A letter addressed to J. L. Gillis, Librarian, California State Library, Sacramento, California, will be given that gentleman's usual prompt and courteous attention.

What Sight Is

All sight is, in fact, an act of judgment. The brain receives messages from each retinal element, and from these messages it constructs a mental picture of the actual scene, much in the same way that a general, whilst a battle is going on, receives messages from all sides, and from these messages forms his idea of what is happening on the field of action. So far does the analogy hold, that the mind supplies from its own knowledge a great part of the mental picture, the actual messages from the retina being quite insufficient to give a complete perception of the scene without.—John Collier.

A Photographic Digest

Edited by H. D'ARCY POWER, M. D., Burlingame, California

TIME AND TANK DEVELOPMENT.

The growing use of one or both of these methods is leading to much investigation and discussion. Among the most valuable of the contributions of the month is a paper by S. H. Wralten and Dr. Kenneth Mees in the "British Journal of Photography." It should be read by all students in full, but the gist of the investigation is contained in the concluding paragraphs here given:

The extent to which development has progressed at any time therefore depends on two different factors, the maximum contrast which a plate will give, and a velocity constant depending on various circumstances.

Returning now to the subject of time development.

With the increasing use of time development it is too frequently forgotten that the time for which a plate requires developing is dependent on the two factors given above; also that the application of any rules found for one batch of a particular plate to further batches of that plate depends on the constancy of those two factors from batch to batch. To state the degree of constancy of those two factors for all plates is not possible, but we have measured both factors for our own plates for the past four years, and we have arrived at the following results:

The maximum Contrast of a plate is reasonably constant from batch to batch; it is, of course, the object of the emulsion maker to keep it so. Varying circumstances do, however, introduce considerable variations, amounting in extreme instances to thirty per cent or forty per cent.

The chief of such circumstances are:

Sudden changes of weather during the making of the emulsion.

Sudden changes in the water supply due to heavy rains.

Changes in the gelatine used.

The Velocity Constant of development (at the same temperature, and for the same developer) varies very greatly with different batches of the same plate. This is mainly conditioned by the rate at which the plates dry, which, even in completely artificial drying systems, such as those used by plate-makers, is always affected to some extent by external weather conditions. Moreover, any change in the gelatine always affects this factor at once.

Measurements made of different batches of various other commercial plates confirmed these results. Thus, in the case of two batches of one plate purchased at the same time, one took four minutes and the other seven to develop to the same degree of contrast.

Generally, our experience is that it is quite unsafe to deduce the time which a plate will require for development from previous experience with other batches of the same plate if any appreciable time has elapsed since those batches were made.

It is usual, in systems proposed for the development of plates by time, to provide for a correction to be applied for other temperatures of the developer than the "standard" one. Such corrections are usually based on a so-called "temperature coefficient" of the developer, which corresponds to the variations in the velocity constant of development with that developer, produced by variations in the temperature. All such corrections, consequently implicitly contain the assumption that the temperature coefficient of a developer is independent of the plate employed.

There appears to be no justification for this assumption. It was not made by Ferguson and Howard in their work on the effect of temperature in development, and one of us experimenting with S. E. Sheppard found that different plates behaved differently in this respect. During the last year we have made a further investigation of the subject.

That investigation showed that:

The effect of temperature is greatly dependent on the plate.

It does not vary appreciably between different batches of the same plate.

It is usually much larger in the case of slow than of fast plates, but this is not necessarily true.

In the case of some plates the effect of temperature within wide limits may be very small instead.

The temperature coefficient of a developer for the same batch of plates is only constant within small limits of temperature.

We conclude, therefore, that tables giving corrections for temperature are not of practical use in calculating the time of development for commercial plates.

The considerations which we have set forth above, therefore, lead us to conclude:

That the calculation of the time of development of plates by the aid of tables is likely to be misleading in consequence of the variation of the governing factors with different batches of the same plate.

That correction of the calculation for varying temperatures is also likely to be misleading in consequence of the wide variation between the effects upon different kinds of plates.

That development of a plate to a fixed degree of contrast by time alone can only safely be practiced if the temperature correction be known for the plate used, and the maximum contrast and velocity constant for the particular batch used.

This latter condition leads to the following conclusion:

Development by time can only be successfully and accurately accomplished if the time required for development is found for each batch of plates, either by the maker or the user.

It must be observed that the conclusions which we have reached only apply to time development, and not to factorial development.

Factorial development consists of the observation of the time required for the first appearance of the image, and the multiplication of that time of appearance by a fixed factor. Variations in the time of development due to alterations of the temperature or of the velocity constant and maximum constant of the plate also affect the time of appearance in the same ratio, and consequently are compensated for by the Factorial system.

The only objection to the factorial system appears to be the exposure of the plate in the early stages of development to the darkroom light, an exposure which renders it impracticable in the case of strongly color-sensitive plates. Even this difficulty may be avoided by the use of separate trial strips to determine the "time of appearance."

"Photography," writing editorially on tank development, points out that dilution of the developer can easily be carried too far, and maintains that the best results are obtained with a fairly strong and therefore quickly acting developer. This is a conclusion I had already arrived at from my own experience. Personally, I am using and getting excellent results with the acid amidol developer ("Camera Craft," March, 1910) diluted three times. A tankful lasts me three days without loss of quality. The "Amateur Photographer" recommends the following formulae for stand development:

For very prolonged development, a dilute glycin developer will be found suitable, owing to its freedom from tendency to stain.

A stock solution of glycin is made as follows:

Boiling water ..... 4 ounces
Sodium sulphite .....2½ ounces
When dissolved, add
Glycin ..... 1 ounce
And then in small quantities ..... 5 ounces

This solution takes the form of a creamy mixture that must be well shaken before use.

For normal stand development take:
Stock solution, as above 1 ounce
Water .....100 ounces
Potass. bromide, one per cent solution .....100 minims

In this dilute solution, development will be complete in about four hours.

This developer will serve perfectly for all types of exposure. If, however, underexposure is known to exist, the bromide may be omitted, and one ounce of ten per cent solution of soda hydrate added.

For known over-exposure, the bromide may be increased to one ounce of the ten per cent solution.

Complete development in this solution will take about one hour.

Development is considerably quickened by reducing the quantity of water, or increasing the proportion of concentrated developer. A solution of one in sixty will give a fully developed plate in about fifteen minutes, but care must be taken to move the plates occasionally, or markings may occur.

The combination of metol-hydroquinone is also a good one for stand development. The following formula may be used successfully:

Metol	35 grains
Sodium sulphite	2 ounces
Hydroquinone	50 grains
Sodium carbonate	1½ ounces
Water	80 ounces

This is fairly rapid in action, and works cleanly and evenly.

Pyro can also be used, and is a well-tried and reliable developer for stand development. The quality of the negatives given, and the characteristic color, render pyro always popular. The Ilford pyro-soda formula has been found a good one for the purpose. It is:

Stock solution:

Water	5½ ounces
Potass. metabisulphite	70 grains
Pyro	1 ounce

The working solution for ordinary development is:

A	Stock solution	1 to 2 ounces
	Water	20 ounces
B	Sodium carbonate (crystals)	2 ounces
	Sodium sulphite	2 ounces
	Potass. bromide	20 grains
	Water up to	20 ounces

For normal stand development take equal parts of A and B, and add four times the volume of water.

The foregoing developers have been used successfully for the production of negatives for stand development; but practically any standard developer, used in a more dilute form than for ordinary dish development, will also prove successful for stand development in a tank.

BROMOIL.

R. H. Wyatt, writing to "Photography," describes a new mode of working that possesses some distinct advantages. He says:

To bleach the bromide print I take some ozobrome solution diluted with four times its bulk of water. (It was diluted some fifteen months ago.) Three-quarters of an ounce of this and a quarter of an ounce of alum solution (three hundred grains to ten ounces of water) and a quarter of an ounce of citric acid solution (thirty grains to ten ounces of water) are added together. I previously tried the ozobrome solution without these additions, but failed to get a satisfactory relief. With the addition of alum and citric acid it works perfectly. After bleaching, the print is washed in two changes of water; in cold weather I use water which has the chill taken off, temperature sixty-five degrees to eighty degrees Fahrenheit. The print next gets its sulphuric acid bath, followed by two quick washes, and is then left lying in a dish of water exposed to the light. The hypo bath is dispensed with entirely.

It is important that the print should not float on the surface of the water and allow parts to be exposed to the air, as if it does these parts will pigment up more darkly than the rest and cause much trouble. Some papers will lie naturally at the bottom of the dish, others will float if allowed to do so. These must be kept down, not by placing anything across the face of the print or a mark will result, but by affixing something to the edge. I find that four small brass clips such as are used for putting through papers to fasten them together, pushed one on to each of the four edges of the print, are quite sufficient ballast to keep the most buoyant paper in position.

The advantages which may be claimed for this method over that which is ordinarily followed by those who work the bromoil process are four in number, and may be summarized thus:

There is a distinct image to guide one while pigmenting, and this image is entirely obliterated by the time the pigmenting is concluded.

There is one bath less required for the preparation of the print, and there is a corresponding saving in the time.

It is possible to prepare the print in any odd quarter of an hour which may be available, and to leave it in the water until it is convenient to complete it. I have left prints for seven or eight hours in this way, and I have no doubt that a much longer time would make no appreciable difference.

Fourthly, there is a comparatively small percentage of bad results.

Of course, if the photographer wishes some portion of the picture to be white when it prints dark in the original bromide, this method is unsuitable. The print may be made darker in any part, and tones may be lightened quite as much as ever ought to be necessary. When the manipulator wishes to change black into white he is almost on the eve of deserting pure photography.

The illustration accompanying this article requires a few words of explanation. The view entitled "Mosspaul" was prepared at 2 p. m. and completed at 6:30 p. m. The sky in this was a blank. I have worked up the sky more than I should have done otherwise in order to show how readily paper prepared in this way takes the pigment. In other respects the print is a straight one in every way, except that a rather softer ink has been used to strengthen the foreground a little.

BROMIDE AND INCREASE OF CONTRAST.

Messrs. A. and L. Lumiere and A. Seyemetz publish in the "Bulletin Societe Photographie Francaise" an account of their researches on this subject, with the following result:

The property which bromide possesses when added to developers (of increasing the contrasts) is not exhibited by other haloid salts nor by other bodies which increase the time of development.

The experiments indicate that this specific property is possessed by bromine in the form of soluble bromide, or by organic substances capable of conversion into bromide by the alkali of the developer.

The results throw no light on the theory of the behavior of bromide in the developer. They suggest that the action of soluble bromide is perhaps due to combinations formed with the silver bromide which has been exposed to light, which compounds are not formed with other soluble haloid salts. It is possible that these compounds are more difficultly reducible by the developer than is exposed silver bromide, an assumption which would explain the increase of contrast by bromides.

GRADUATED COLOR-SCREENS.

Some few years ago many of us remember the advent of Alvin Langdon Cobourn in this city, and the enthusiasm for gum printing that followed. Since then Mr. Cobourn has become a light in the photographic world, and although, like so many of our artists, he has left us for the British field, we always follow his work and writings with interest and affection. I therefore make no excuse for transferring to our pages the following letter from him to our contemporary, "Photography":

There is a sort of mad joy about acquiring a new piece of photographic apparatus. The exact sensation is difficult to define, and really has to be experienced to be appreciated. To buy a camera and use it for the first time is an adventure, to find out the capabilities of a new lens is a joy forever, but to acquire a graduated color filter is to run out of superlatives.

The idea, like so many good things, is so simple that one wonders why it was not thought of long ago. Who has not felt the need of more exposure in the foreground of skyscapes? Long ago, in the dark ages, people used to make what were termed "combination prints." They took the cloud from one negative and combined it with one or more bits of foreground from others, which resulted in something the like of which was never seen on sea or land; but now such complicated proceedings are unnecessary. One simply gets a Sanger-Shepherd graduated screen and the trick is done.

Perhaps I had better explain that the filter is a deep yellow at the top, and tapers toward clear glass at the bottom; also that it slides up and down in a ring that fits on the end of the lens. This sliding adjustment allows one so to arrange matters that a high or low horizon may be taken into account.

Personally, I do most of my landscape work with a quarter-plate Reflex. There was a time when I used to break my back with a 10x8 stand camera. I would carry the great thing about with me all day and get so tired that I had not the energy to

make an exposure. But I am getting older and wiser. On the ground glass of my reflex I can easily determine the amount of screening necessary. The filter I have is about ten times at one end and no times at the other, and, of course, the exposure varies according to the extent it is slid up or down. There seems always to be a tendency, I do not know why, to over-expose cloudscapes and under-expose sunsets, unless one uses some sort of guide.

I myself always use an exposure meter now, and there is no more trouble. Of course, it will not think for you, and it must be mixed with an equal part of common sense (saturated solution); but it is a wonderful help in any sort of photography that depends on accurate timing so much as does cloud work.

I well remember the first time I saw one of these screens. It was in the corner of the "Fountain Court" of the New Gallery, when the R. P. S. was holding its annual exhibition. They were of various shapes and sizes and depths of color; in fact, they made a noble display that would have gladdened the heart of any enthusiastic knight of the lens. As I was just starting on a tour in Bavaria, I at once got one. All this happened some two years ago, but negatives, like wine, improve with the keeping, provided you have washed all the hypo out of them. For as time goes on you realize which are the best ones. So before long I expect some of these pictures will blossom forth from their negative buds into full-blown exhibition prints.

When I think of those negatives and their making I feel like breaking into verse—into the poetry of cloud photography. The rhythmical utterance of one of nature's most inspiring spectacles. For who has not gazed in wonder at these great white and silver giants towering majestically above us, and wondered why they are there. Another of nature's great mysteries. Perhaps they were invented on purpose for the photographer. At any rate, his subtle art is necessary to do them full justice, for moving clouds and water seem to me to be the special province of the camera.

I can hear the editor saying, "Why is he writing all this nonsense about clouds? What my readers want is a practical article on how to use a graduated filter."

Perhaps he is right!

Well, my advice is this: Get one of these screens, and on a fine day—just after a storm has cleared is best—walk out over the countryside with an open mind and loaded dark slides. Study carefully with your eyes and on the ground glass the panorama of the sky, and be sure that your plates or films are isochromatic. Beyond this you are in the hands of the gods.

I am not aware that graduated screens can be obtained in the United States. J. Griffin of Kingsway, London, make two forms; one called the "Grada" is graduated, but fixed. It sells for from two to five dollars, according to size. The sliding form referred to by Mr. Cobourn is called the "Iris," ranging in price from three to ten dollars.

STEREOSCOPY WITHOUT A STEREOSCOPE.

In a recent letter to the "Amateur Photographer," T. E. Heath stated that, when the corresponding points on two stereograms were separated by an interval not exceeding two and one-half inches, he found the use of a stereoscope unnecessary. He asked for the experience of others, pointing out how greatly stereoscopic illustration would be extended if such were the general experience and could be universally employed. This has led to much correspondence and comment. As the subject is one of practical importance, I reproduce some of the answers and criticisms. First, as to mode of views, one writer says:

"My method is to look straight at the center of the division between the two stereograms, and gradually to change the focus of my gaze, as though I were looking through the picture, at that point, to the full extent of my range of vision. Very gradually, thus gazing, I approach the picture, and when I have reached the distance at which I could comfortably read small type, the stereoscopic relief picture has formed itself perfectly. I find it a help, but not a necessity, to make 'blinkers' by curving my hands round my eyes on either side.

"I experience no strain to my eyes so long as my sight, which is focussed on distance for this stereoscopic seeing, is not transferred with a sudden jerk to other objects actually in the same plane as the

picture, but, of course, requiring a reading distance focus."

To this another adds:

"For seeing paper prints stereoscopically, I should hold a card, black on both sides, in contact and at right angles to the division of the prints. Such difficulty as there is in getting the stereoscopic effect is due, I believe, mainly to the inequality of lighting of the two halves, unless special care is taken to prevent such inequality."

The "British Journal of Photography," noting the correspondence, writes as follows:

Seeing Stereoscopically Without a Stereoscope.

In two contemporaries we have lately seen a suggestion to the effect that when stereoscopic slides are mounted with a separation not exceeding two and one-half inches they can be seen stereoscopically without the aid of a stereoscope. Slides so mounted are published in each case, and readers are asked to send up an account of their experiences so that the writer may ascertain the facts or the case. All this strikes us as somewhat unnecessary, because the facts of the case are already very well known. So long as the observer is not required to produce an adjustment of the eyes that is impossible to him he can always see stereoscopically without a stereoscope after a little practice. As a rule, we cannot make the visual axes diverge—a few people can, but they are exceptions—and as a consequence we cannot combine pictures that are separated by a greater distance than are our eyes, the average separation of which is about two and one-half inches; therefore this is the limit of separation for a slide that is to be viewed without any instrumental aid. There seems to be much misconception on this subject of seeing stereoscopically, and we notice mistakes in both of the communications we are referring to. In one the following instructions are given for producing the required effect. The reader is told to hold the print horizontally at the distance he reads fairly small print. Look straight forward, but easily, at some conspicuous object in each photograph. Suddenly or gradually the objects will approach each other till they melt into one. But nine times out of ten, or possibly ninety-nine times in a hundred, the merging of the prints when produced in this way gives a pseudoscopic effect, because the observer squints. Often the fact that the result is pseudoscopic is not noticed because this is rather a subtle effect that few people are acquainted with, but two other tests are available. When seen by squinting the image is apparently much smaller than when seen properly, while if the left eye is shut it will be found that the right eye is looking direct at the left-hand picture. The best method of getting the true effect is the following: Hold the slide at a full reading distance, and vertically, not horizontally, look over or under it intently at some distant object some ten or fifteen feet away. Then suddenly interpose the slide between the eyes and the distant object. Four images will then be seen, and the two center ones will merge together and give the stereoscopic effect. A little practice is required, but the accomplishment is very easily acquired.

SPLENDID PHOTOGRAPHS.

N. A. Howard-Moore, the well known amateur photographer, has placed four of his beautiful pictures on exhibition at McDermid's drug store, to give the public an opportunity to view his artistic work, work that is well known to all camera men. The pictures are: "The Stream," "On the Otonabee," "The Crane's Roost," and the "Old Beach." The latter is a picture taken in Jacksons Park. The different features of the scene, frequently witnessed by the people of this city, are distinctly brought out in the photograph. These pictures have been exhibited at Jamestown, New York, Montreal, Toronto, and Winnipeg.—"The Examiner," Peterborough, Ontario.

A REPORT FROM PRESIDENT LIVELY.

A letter from President Lively, of the Southern School of Photography, advises that the season's attendance is most gratifying; in fact, much larger than they had thought possible. Better still, those in attendance, are showing a marked degree of enthusiasm that foretells rapid and exceptional progress. Seventeen States and two foreign countries are represented in the enrollment. The post graduate course has brought many photographers who wished to round out their practice; and, all in all, the School is enjoying one of the most successful seasons in its history.

The Amateur and His Troubles

Conducted by FAYETTE J. CLUTE

SENSITIZING CARBON TISSUE.

In a studio the other day the talk turned to carbon printing and Mr. Oesting's article in the June issue. It seems that the article in question had revived the proprietor's interest in the work, and he had dug up some experimental prints made twelve or fourteen years ago, together with data made at the same time. One set of prints had been made to ascertain if the time of immersion in the sensitizer had the important bearing upon the subject that all the books indicated by giving the exact time of immersion in the bichromate solution. The results showed very plainly that degrees of partial saturation of the film, that is, varying short immersions, resulted in a slight variation in the speed of the tissue; and, of course, in the contrast obtained, up to an immersion of six minutes. After that period, which seemed to mark fairly closely the time necessary for complete saturation, absolute uniformity of resulting speed seemed to rule. Immersions of eight, twelve, sixteen, and twenty-four minutes appearing to cause not the slightest variation. Another set, made with varying strengths of sensitizing solution, had an entirely different story to tell. They showed on even gradation in degrees of contrast from the one sensitized in one-half of one per cent solution, up to a ten per cent solution; the latter being practically a saturated one. The weaker bath gave a slow tissue with increased contrast, while a strong solution gave high speed with attending degrees of softness according as the strength was increased. These experiments, according to the notes made at the time, confirmed the statements made by G. H. James in an article on carbon printing in "Amateur Photography" of London, in January, 1896. The notes explained that the samples had been sensitized and then squeegeed to ferrotype plates in accordance with a suggestion made in the same article. This last procedure facilitating the work and shortening the time; only about two hours being required for the tissue to become dry with a beautiful smooth surface, then to drop from the ferrotype plate. The procedure also avoided any danger from the deleterious action of impure air upon the wet tissue; and, by enclosing each ferrotype plate in a bag or envelope made of ruby paper, all danger of strong light reaching the tissue when it left the ferrotype plate was avoided as well. This allowed the worker to set the tissue-bearing plates in any convenient place where drying would take place rapidly, going back in a couple of hours and to the tissue ready for printing, with a fine, smooth surface that assured the best possible contact with the negative. All in all, it was agreed that the excellence of Mr. Oesting's plan could not be questioned on account of the time of immersion being disregarded, saturation of the tissue being practically achieved; while the quickness of drying, in a great measure due to the absence of moisture in the support, as would result from immersion, tended to better results; the quicker the drying of the tissue after sensitizing being universally acknowledged an important factor. However, it would seem that the plan put forward by Mr. James, that of keeping on hand stock solutions of the bichromate sensitizer varying in strength from one-half of one per cent to saturation, and using them according to the amount of contrast desired, is a most desirable method of procedure.

DETECTING INCORRECT EXPOSURE.

A correspondent asks how he can determine, at the earliest possible moment when developing, whether a plate is under or over exposed. The most simple method is to employ one developer until one is so thoroughly familiar with its action that any increase or decrease in

the time of first appearance of the image is at once noticeable. Then the rapidity with which the middle tones follow this first appearance of the high lights also assists; but this latter action is dependent upon the particular developer used, and its strength. With metol, for example, the middle tones follow the high lights so quickly that one accustomed to some other developer would at once suspect over-exposure.

COPPER-SILVER INTENSIFIER.

A correspondent asks for the old formula for a copper-silver intensifier that went the rounds of the photographic press some twelve years ago. Here is one that was published in a book of formulas dated 1895, and while we cannot vouch for it, having never tried it, it is no doubt the one wanted. If our correspondent can risk the peculiar susceptibility of silver nitrate solutions to form stains at unexpected times, the formula is worthy of trial as it gives exceptional density. It reads: Dissolve one-fourth ounce of copper sulphate in four ounces of hot, distilled water; dissolve a like amount of potassium bromide in a like amount of distilled water; and, when the first is cool, mix the two. Bleach the negative in this and then wash gently for only three or four minutes. Water allowed to flow rapidly over, or splash upon the negative, during this washing, will leave its mark when the silver is applied. The operation must be carried on in the darkroom and the silver solution kept from the light. After the washing prescribed, immerse in a five per cent solution of silver nitrate; distilled water being used for the latter as well. If still more strength is desired, rinse well and immerse in an ordinary developer. If too much strength results from the first or silver blackening, a short immersion in a clean hypo bath will reduce it. To cut down the effect of the second or developer blackening, use any regular reducer. A good wash must of course follow the use of the hypo bath.

PRINTING ON SILK.

A correspondent asks for a formula for printing on silk, but wants something that does not involve a dressing of gelatine or arrowroot to fill up the pores of the cloth. We doubt if prints made on silk, without some such facing to keep the image on the surface, will be satisfactory, but here is a formula, due to Opphofen, that appeared in the German magazines a number of years ago. First free the silk from dressing by well washing in warm water; then float for two minutes on a solution made up as follows:

Sodium chloride .....40 grains
Ammonium chloride ...40 grains
Water, distilled ..... 4 ounces
Ammonia, .880 .....60 minims

Hang up to dry by means of wooden clips. As long as it is only salted, it keeps well. For use, sensitize for two minutes in a bath of one hundred and fifty grains of silver nitrate to each ounce of distilled water. Dry in the dark. Print quite deeply and tone in the ordinary acetate bath. Fix, wash well, blot off with blotting paper and then dry. These prints on silk were originally intended to be colored by rubbing in crayon colors and fixing with ordinary fixatif, and this fact suggests that they may have been lacking in detail and brilliancy of their own. We would recommend that the silvering solution be applied with a tuft of cotton drawn into the end of a glass tube with a piece of string, applying it to the cloth tacked down on a piece of blotting paper on a board. This will be found more economical and the exact time is not important. Apply in one direction and then across, to be sure of even sensitizing.

"THE AGFA BOOK OF PHOTOGRAPHIC FORMULA."

This is a bulky little book of about one hundred and fifty pages, containing formulas for about everything that a photographer could wish to use, valuable tables, and a wealth of information, all in compact, yet full, form. Formulas are given for all the different plates and papers, tank development coming in for a good share of attention. As a formula book it is invaluable to the worker who desires to have all the best formulas together in convenient form. Blank pages are provided so that the worker can add any others which he may wish to keep in connection with those given. Do not neglect to write for a copy at once. Address, Berlin Aniline Works, 213 and 215 Water Street, New York.

International Photographic Association

OFFICERS OF THE I. P. A.

F. B. Hinman, President, Room 4, Union Depot, Denver, Colorado.

J. H. Winchell, Chief Album Director, R. F. D. No. 2, Painesville, Ohio.

Fayette J. Clute, General Secretary, 713-715 Call Building, San Francisco.

Harry Gordon Wilson, Director Stereoscopic Division, 4954 Washington Ave., Chicago, Ill.

Charles M. Smythe, Director Post Card Division, 200 S. Marion St., Denver, Colo.

NOTE.—I. P. A. members, or applicants for I. P. A. membership, desirous of joining the Post Card Division, should enclose three or more cards of their own make to the Director for approval. If they are of requisite quality a letter "X" will be placed after the member's number indicating membership in the Post Card Division. Always request a new notice in renewing your subscription. When desiring a reply from the Director, kindly enclose stamp. Address Charles M. Smyth, 200 South Marion St., Denver, Colo.

George E. Moulthrope, Director Lantern Slide Division, Bristol, Conn.

Edward F. Cowles, Secretary Lantern Slide Division, 11 Oak St., Bristol, Conn.

ALBUM DIRECTORS.

Alabama—Richard Hines, Jr., 155 State St., Mobile.

Alaska—P. S. Hunt, Valdez.

California—Sigismund Blumann, 3159 Davis St., Fruitvale, Cal.

Colorado—O. E. Aultman, 106 E. Main St., Trinidad.

Connecticut—George E. Moulthrope, Bristol.

Florida—Capt. E. S. Coutant, U. S. Life-Saving Service, Oak Hill.

Illinois—George A. Price, R. F. D. No. 1, Summit.

Indiana—H. E. Bishop, 1704 College Ave., Indianapolis.

Iowa—C. E. Moore, Eddyville.

Kansas—H. E. High, R. F. D. No. 1, Wilson.

Kentucky—Roy J. Sawyer, 1564 Greenup St., Covington.

Maryland—E. G. Hooper, 218 East 20th St., Baltimore.

Massachusetts—John Mardon, 161 Summer St., Boston.

Michigan—W. E. Ziegenfuss, M. D., 327 West Hancock Ave., Detroit.

Minnesota—Leonard A. Williams, St. Cloud.

Mississippi—Emory W. Ross, Institute Rural Station, Edwards.

Missouri—Wharton Schooler, R. F. D. No. 2, Eolia.

Montana—Mrs. Ludovica Butler, 932 W. Broadway, Butte.

Nebraska—Miss Lou P. Tillotson, 1305 South 32nd St., Omaha.

New Hampshire—Mrs. A. Leonora Kellogg, 338 McGregor St., Manchester.

New York—Louis R. Murray, 266 Ford St., Ogdensburg.

New Jersey—Burton H. Albee, 140 State St., Hackensack.

North Dakota—Jas. A. Van Kleeck, 619 Second Ave. North, Fargo.

Ohio—J. H. Winchell, R. F. D. No. 2, Painesville.

Oregon—Leonard S. Hopfield, Box 622, McMinnville.

Pennsylvania—William C. Barbour, Sayre.

South Dakota—C. B. Bolles, L. B. 351, Aberdeen.

Texas—Frank Reeves, Graham.

Utah—John C. Swenson, A. B., Provo.

Wisconsin—H. Oliver Bodine, Racine.

NEW MEMBERS.

2500—B. P. Angle, Cowles, Neb.
4x5, 5x7 and post cards, developing paper, of miscellaneous outdoor work; for the same. Class 1.

2501—J. C. Bell, Trinidad, Colo.
Class 2.

2502—Marvin R. Neil, Ridott, Ill.
4x5, developing paper, of landscapes, snow scenes, and water scenes, for water, waterfalls, landscapes, nudes, and views of mountain life; for the same, on developing paper only. Class 1.

2503—L. W. Storm, Valdez, Alaska.
Class 2.

2504—Charles H. Swanson, Ft. Liscum, Alaska.
Class 2.

2505—Newton W. Emmens, Box 356, Trout Lake, B. C., Canada.
Class 2.

2506—Walter S. Snyder, 1211 W. Susquehanna Ave., Philadelphia, Pa.
5x7, various papers, of land and waterscapes, principal buildings, etc.; for the same. Class 1.

2507—Miss Florence E. Hopewell, Tekamah, Nebr.
Class 2.

2508—Glenn Staley, Clear Lake, S. Dak.
5x7, printing-out paper, of views; for the same. Class 1.

2509—D. C. Davison, Texas City, Tex.
3¼x5½, developing paper, of general views; for post cards. Class 1.

2510—Carl H. Barton, Box 253, Paris, Tex.
3¼x5½, developing paper, of such few subjects as a small Texas town affords; for such subjects as freak and uncommon views. Class 1.

2511—J. E. Ender, 124 W. Lafayette St., Tampa, Fla.
Class 3.

2512—Mabel Douglass, 310 South Walnut St., Iola, Kans.
4x5 and bromide enlargements to 10x12, developing paper, of home portraits, animals and views, for the same. Class 1.

2513—John Beck.
3¼x5½, post card size, developing paper, of general subjects, for the same. Class 1.

2514—Avery Walter, Scars, Mich.
4x5, developing and printing-out papers, of landscapes, views and home portraits; for landscapes and views, post cards only. Class 1.

2515—W. E. Fisher, 338 Edmond St., Pittsburg, Pa.
Class 2.

2516—Mrs. W. A. Bexley, Hobe Sound, Fla.
Class 2.

2517—Eugene A. Lewis, R. F. D. No. 1, Kittery Depot, Maine.
3¼x5½; for pictures of historical interest, animals, views, etc, in post cards. Class 1.

2518X—P. E. Hixon, Fredonia, Kan.
Post cards, various papers, of general landscapes, etc., for the same. Class 1.

2519—J. Clarence Norton, R. F. D. No. 2, Moran, Kan.
4x5, developing paper, of prairie farm scenes and animals; for anything of interest; post cards only. Class 1.

2520—W. C. Ahrens, Box 805, Tucson, Ariz.
Class 2.

RENEWALS.

1413—Walter V. Overman, 1935 North C St., Elwood, Ind.
Stereoscopic views of general outdoor subjects, for the same. Class 1, except United States and Canada. Class 2. Foreign exchanges especially desired; good work only.

1928—De Lancy Cossett, R. F. D. No. 1, Box 44, Wilmington, Ill.
4x5, and post cards, developing paper, of landscapes, river scenery, camp life, and street scenes; for like subjects or anything of interest. Class 1.

2077X—W. G. Richter, 400 Goshen Ave., Elkhart, Ind.
Has lost his records, but will repay any cards owed if notified.

2272X—O. F. Jordan, Evanston, Ill.
Class 1.

2422—S. O. Barnum, Shinglehouse, Pa.
4x5 and up to 16x20, developing paper, of landscapes, colored in oil or pastel, genre subjects, and general pictorial work; for general pictorial work either in monochrome or color. Class 1.

2433—Clifford Kirk, Kincardine, Ont., Canada.
In addition to the work mentioned in his notice in the May issue, he has 5x7 portraits of studio work, also 3¼x5½ views and portraits. Class 1.

2472X—Frank M. Weaver, R. F. D. No. 1, Box 79, Junction City, Wis.
Post cards. Class 1.

2492—J. T. Miller, R. F. D. No. 1, Murat, Va.
4x5 to 8x10, of portraits and views, such as scenery and public buildings; for the same in post cards and stereoscopic views, Class 1.

CHANGES OF ADDRESS.

1750X—Felipe Floresll, Apartado No. 8, Zitacuaro, Mich., Mexico.
(Was Patzcuaro, Mich., Mexico.) Unable to exchange at present. Will give notice when ready to do so.

1847—R. S. Gallie, Box 449, Little Rock, Ark.
(Was Box 68.)

1864—A. G. Lindgren, Hasty, Minn.
(Was Verndale, Minn.)

1935—Emory W. Ross, Eureka, Ill.
(Was Edwards, Miss.)

2059X—Don Campbell, Lock Box 381, Ashland, Ore.
(Was Hilt, Cal.)

2100—Mrs. R. E. Pennington, R. F. D. No. 3, Box 386, North Yakima, Wash.
(Was Naches, Wash.)

2134X—Joseph R. Poole, 162 Shawmut St., Chelsea, Mass.
(Was Holbrook, Mass.)

2176—Phil A. Friedell, Box 44, Victor, Mont.
(Was Drummond, Mont.)

2278—L. I. Neikirk, 933 Portland Place, Boulder, Colo.
(Was Urbana, Ill.)

2283—Oscar E. Scholen, R. F. D. No. 1, Woodinville, Wash.
(Was Port Townsend, Wash.)

2373—Mrs. George Nichols, 132 W 18th St., Los Angeles, Cal.
(Was Dinuba, Cal.)

2417—Frieda Sutherland, care Hart Photo Studio, Minot, N. D.
(Was Box 157, Fergus Falls, Minn.)

2445—James E. Mead, care Mead Cycle Co., 35 Wapping, Liverpool, England.
(Was Chicago, Ill.)

2457—John S. Shahan, Attalla, Ala.
(Was Marion, Ala.)

2483—Oliver Frantz, Loveland, Colo.
(Was Platteville, Colo.)

WITHDRAWALS.

2253—Mrs. Wm. E. Knowles, Fridley, Mont.
On account of lack of time.

2448—M. Crumb, Hospital Corps, U. S. A., Fort Worden, Wash.
An accident destroyed such a large percentage of his negatives that it will be three or four months before he is able to again take up exchanging, at which time a new notice will be given.

Club News and Notes

DETROIT CAMERA CLUB.

An exhibition of the prints entered for the June competition was held by the Detroit Camera Club, June seventh, at their club rooms. Mr. Wheatley, an artist having years of experience, criticised and judged the prints. The subjects named for this competition were marines, and landscapes with figures. "Moonlight," by J. E. Scott, was given first award, and "Sailing," by W. B. Wilcox, took the second. These two pictures will be properly labeled and hung in the club rooms. A monthly competition is held each month by the Club. All prints entered therein are exhibited for a short time and then awards made by a competent judge. The club is enjoying its new quarters at 6 Adams Avenue West. They overlook the Grand Circus Park, and, on that account, the members like to visit them, even when not photographically inclined.

C. J. SCHAUER, Secretary.

CHICAGO CAMERA CLUB.

At the annual meeting of this club, held at the club rooms June second, about twenty-five members being present, the following officers were elected for the ensuing year: President, George C. McKee; Vice-President, C. B. Hale; Secretary-Treasurer, H. A. Langston (re-elected), and Directors, E. F. Oyster, H. H. Hyde, F. M. Tuckerman, and W. F. Willis. The position of Assistant Secretary-Treasurer was also created, and G. Sohn appointed thereto. The annual report of the Secretary-Treasurer showed the affairs of the club to be in prosperous condition. A number of improvements have recently been made, among them being the installation of an autochrome room and a Cooper-Hewitt light for portraiture. During the summer months a school of photography will be established.

H. A. LANGSTON, Secretary.

furnished, and the machine can be used in any room where there is an ordinary incandescent lamp-socket. As will be seen from the illustration, the machine is run by a small motor. The lamp used is a Nernst Glower. The light-chamber is the oblong box, made long enough to allow of the light being moved nearer to or further from the negative. The latter is held at the front end of the light-chamber by a special clamping device. The box tilts to the rear to bring negative in a horizontal position for changing, and the lid in the box gives access to the interior, where grooves are provided next the negative, for the introduction of vignetting cards, ground-glass retarding sheets, and other methods of control. The timing is done by the motor, and as both motor and lamp are in the same circuit, any fluctuations in current will affect both alike. If light grows brighter or dimmer, the motor will run faster or slower, and equalize the time of printing.

A NEW TRIPOD.

We have recently had the pleasure of examining one of the new and improved "Quick-Set Metal Tripods," at one of the local dealers. To say that it at once recommends itself is describing it only in a very superficial manner. The ease with which it can be extended, or closed up for carrying, is, of course, the principal feature. In addition, it is very compact, despite the rigidity which its construction assures. There are no buttons or pins to get out of order and cause trouble. It is advertised on another page this month, and we would recommend its being given full attention by those desiring the last word in a rigid, compact, and quickly set up tripod. It is sold by George Murphy, Incorporated, 59 East Ninth Street, New York. Write them for a circular, or send ten cents for their new three-hundred page catalogue.

"HOW AND WHY IN PHOTOGRAPHY."

The above is the title of a handsome compilation of informative matter that will prove of the highest interest to all our readers, both professional and amateur. Just as a sample, it contains full instructions for making these firelight effects that are found so interesting by many photographers in both ranks; line drawings explaining the method fully, together with reproductions of examples in colors. The booklet is published by Burroughs, Wellcome & Co., and they advise that they will gladly send a sample free to any of our readers who will write for it. The address of the United States depot is: Burroughs, Wellcome & Co., 35 to 39 West Thirty-third Street, New York.

AUTOTYPE CARBON TISSUES.

The permanency of Carbon, the power to produce all that the negative shows, the new increased range of tints, the various means at hand to use Carbon Tissue on any negative, is slowly but gradually bringing the use of Carbon into all branches of photography. For transparencies, lantern slides, porcelain and ground-glass pictures, photogravures, ceramic photography and, above all, for landscapes, portraits, and miniature portraits, Carbon is supreme. For the new oil process the transfer papers offered by the Autotype Carbon Company have given the best results. George Murphy, Incorporated, 59 East Ninth Street, New York, are American agents.

A BEAUTIFUL STUDIO.

For some time the photographic studio of W. J. Collins has been undergoing repairs, and the inside has been redecorated. No money or pains has been spared to fit up the rooms artistically, and the effect is wonderfully pleasing. The walls are covered with specimen work, and to complete the good effect, he has put new pictures in the cases outside. Mr. Collins is an artist in a thousand, and Rapid City is fortunate in having such an one in her midst.—Rapid City (South Dakota) Journal.

ANNUAL MEETING, AMERICAN FEDERATION.

The annual meeting of the American Federation of Photographic Societies was held on Saturday, May seventh, 1910, at the Museum of Art, Toledo, Ohio. The meeting was well attended, and the delegates were highly pleased with the success of the Sixth Salon and the conduct of the affairs of the Federation during the past year. All expenses were met and a substantial balance remains in the hands of the treasurer. It was decided to eliminate all foreign exhibits from the Seventh Salon and make it purely American, as the name implies. The number of frames hung will not exceed two hundred, and the standard will be raised to meet the standards of the highest art critics.

Desiring the support of all photographic journals equally, it was decided not to designate any one publication as the official organ. Hereafter all work submitted for the jury must be sent framed, except from points west of Denver. The Hanging Committee will frame Western prints economically at the cost of the entrant.

The following officers were re-elected: George W. Stevens, President; John F. Jones, Vice-President; George W. Beatty, Treasurer; and C. C. Taylor, Secretary, all of Toledo. William A. Rheinheimer, of St. Louis, was also re-elected Historian.

SOME FINE PORTRAIT WORK.

Just recently there has reached our desk some very fine examples of portraiture from the studio of Moyemont, of La Junta, Colorado. The brilliancy, combined with fine modeling and delicate texture, make these examples exceptionally pleasing. They were made with Rodenstock's "Eurynar," Series IV, No. 6, sold in this country by James Frank & Son, Broad Street, Augusta, Georgia. Any of our readers interested in fine lenses of the anastigmat type, particularly at a reasonable price, should get a catalogue of the above named American agents. Mr. Moyement's work is certainly very fine, with his new equipment being even better than the work which earned him such an enviable reputation in Milwaukee before he removd to Colorado.

AN IMPORTANT CHANGE.

The Multiscope & Film Company, for so long at Burlington, Wisconsin, wish to advise their customers that they have changed the name to the Partee Photo Supply Company; and, owing to their rapid growth, they desire, if such be possible, to give their customers better service, and have, therefore, moved their business to Chicago, locating at 1223, 25 and 27 Wabash Avenue. They wish to add that their new quarters will be filled with a fresh and complete up-to-date stock of all photographic supplies, and that they will continue to manufacture their famous Al-Vista cameras. One of these Al-Vista cameras was purchased by the Smithsonian Institute for the Roosevelt expedition in Africa and was used with great success on this trip. To show how widely distributed this camera has become, the firm recently received a letter from the chief engineer of the Siberia Railroad, asking them to send him one of their Al-Vista Cameras, as he had recently seen one of these cameras used on the headwaters of the Amazon in South America, and was very much pleased with the work it did.

BROMIDE ENLARGING.

A branch of photography that has proven itself most profitable, both to the portrait and commercial worker, is bromide enlarging. Many studios that find business falling off with the wane of seasons, take the opportunity, during these dull periods, of offering special inducements to the public in order to get sittings, thereby distributing the work more evenly over the year. A bromide enlargement is one of the most effective as well as the most economical premiums to offer; its apparent value being great to the prospective customer, while its cost is comparatively small. A prominent worker in a small Western town offered, to persons having sittings before a certain date, two fourteen-inch sepia enlargements and ten of his regular cabinet prints, at the customary dozen price. This method of advertising proved a great success and has the hearty endorsement of the photographer in question. The growth of this business and the development of the specialist have demonstrated that he can do the work cheaper and better than the operator who makes only an occasional enlargement. The expert, working all day and every day under constant light conditions, will make a better enlargement at the first trial than the less experienced operator after several trials, and without the latter's consequent loss of time and material. Again, the specialist employs time-saving arrangements that are not possible in the small plant; and, in connection with his greater skill, the certainty of correct exposure, and the small waste, he is able to make and sell enlargements at a price that is lower than the actual cost of production in the average studio or workroom. The Photo Craft Shop of San Francisco is a leading house in this line and has assisted materially in introducing and developing this branch of photography. Their experience along these lines is at your disposal for the asking. You should at least procure a copy of their price list and discounts; a post card bringing them.

CAMERA WANTS

Advertisements of the nature shown below will be inserted under this heading at the rate of fifty cents each insertion, for twenty-five words or less; each additional word, two cents extra. Those of positions wanted inserted free. No business advertisements will be accepted.

FOR SALE The Western Button Company's novelty manufacturing business, established twelve years in Denver, Colo. Exclusive and only business of its kind west of Chicago; unlimited possibilities for future expansion in this business. The present owner is an old man who wishes to retire; the business has been conducted by a manager for the past year. Will sell at invoice price, $8,000.00; factory rent, $37.50 a month. A good business man or woman can easily make this business clear itself every year. Almost anybody can learn this business in a month's time. Strictly cash business, no debts, all clear. We do not ask any bonus for established business. Our specialties are colored photographic celluloid covered pictures mounted, advertising celluloid work, all the latest unique novelties, etc. Here is a good opening for some person to live in the best climate in America, together with doing a profitable business in the most progressive city in the West. Might consider some trade in the way of an income business property—at cash value only—that will require but little attention. T. J. Moynahan, Sole Owner, 1526½ Champa St., Denver, Colo.

FOR SALE Only photographic skylight, growing town 5,000, reasonable rent, tent and penny competition, selling on account of health. Good opening, $300.00 and pay for stock. Box 235, Rockwood, Tenn.

POSITION WANTED by young married man, age 22, first-class darkroom man or view photographer, three years' experience. Will go anywhere in the West. Address Box 155, Lind, Wash.

WANTED A steady printer for developing paper. Young woman preferred. Write experience, etc. Richardson's Photo, Bemidji, Minn.

FOR SALE A good Studio, neat and well equipped. On account of failing health, I will dispose of same cheap. Am doing a big business and it is a snap for someone. Rent reasonable. Write for full particulars, Frank St. John, Fairmont, Minn.

FOR SALE Here is the biggest snap ever offered in the way of a complete Photo Studio. My success in the real estate and automobile business induces me to offer for sale my entire Photo Studio, which I will sell at a bargain. It is a good-paying business, everything in first-class condition, and goods will inventory twice what I am asking. The location is the best in the city, and all that is necessary to make an immediate success is good work and attention. Here is a fine opportunity for someone. If interested, write for full information to R. H. Mertz, Livingston, Mont.

WANTED An experienced lady, in Studio, as developer. Good permanent position to right party. State salary and experience in first letter. Address Golling & Hesse, 620½ Nicollet Ave., Minneapolis, Minn.

WANTED A first-class man for all-around work, one who can take full charge of my Studio. Good and steady position for right one. State wages in first letter. For full information address C. A. Pickering, Sidney, Mont.

WANTED At once, a good all-around man who understands the business; will pay good wages to right party; $80.00 per month, or more, if he is worth it. I want a good, steady, reliable party; others need not apply. For full particulars, write to S. O. Erickson, Fargo, N. Dak.

FOR SALE A first-class Studio, equipped with all modern conveniences, in good location and doing a fine business. Must dispose of it on account of other business. This is a good opportunity for someone, and I will sell most reasonably and on easy terms. For full information, write J. T. Austinson, Owatonna, Minn.

FOR SALE A 4x5 Korona V, latest model, autex shutter, ray filter, portrait attachment, three holders, and one latest Eastman tripod. Make offer. Address, F. L., care "Camera Craft," San Francisco, Cal.

POSITION WANTED By first-class, experienced operator who is a good printer and capable of taking charge. A1 references. Address X., care "Camera Craft," San Francisco, Cal.

HELP WANTED Photographer (one that can play the flute preferred) for suburban town, lady or gentleman. Address, E. S., care "Camera Craft," San Francisco, Cal.

FOR RENT Photo Studio in Idaho, doing a good business. Only good workmen need apply. Please do not apply unless you mean business. Address, Cutler's Studio, Blackfoot, Idaho.

FOR SALE Ground-floor Studio, with living rooms, building 20x90, low rent, doing a good business. Town of 7,000. Write for particulars. G. C. Ragan, Albany, Ore.

FOR SALE Hall reflecting camera, 4x5, with Planatograph lens, in first-class condition and practically new. Address J. N., care "Camera Craft," San Francisco, Cal.

FOR RENT Photo Studio in Idaho doing good business. Only good workmen need apply. Reference required. Address Cutler's Portrait Studio, Blackfoot, Idaho.

FOR SALE Main Studio in northern Iowa; population 1,500. Will sell cheap on account of poor health. Also have branch in southern part of Minnesota. Each Studio paying about $1,200.00 per year. Address "R," care "Camera Craft," San Francisco, Cal.

FOR SALE Having rented a Studio in Waverly, Iowa, I offer for sale one of the best photo cars in the State, almost new, double skylight. If interested, write for description and picture. Address F. C. Gallagher, Waverly, Iowa.

WANTED A young man who is a good retoucher. Send sample and state salary required. Permanent position to right party. Address H. W. Donner, South Kaukauna, Wis.

WANTED General lady assistant for studio work. Norwegian or German preferred. Good position to right party. For full particulars, write J. A. Tweit, Appleton, Minn.

HELP WANTED A good rapid lady retoucher and receptionist for first class studio. Would prefer party who is able to take full charge after January 1, 1911. Give full particulars and references, and state wages expected. Address O. P. Angvire, Spokane, Wash.

STUDIO WANTED in good California town. Give full particulars. Address W. H. A., care "Camera Craft," San Francisco Cal.

FOR SALE No. 4 Cartridge Kodak, size of pictures 5x4; original cost $35.00; in good condition; make offer. Address E. P., care "Camera Craft," San Francisco, Cal.

CAMERA WANTS—Continued.

VALDEZ, ALASKA, Photograph gallery for sale; portraits, views, and commercial work; high prices; making money. Full equipment, including three furnished living rooms over studio. Have mining interests that require my immediate attention. Price, $1,000.00. George G. Cantwell, Valdez, Alaska.

PHOTOGRAPHER WANTED One who can buy new 8x10 studio outfit; good business in best town in Nevada, "booming"; will sell building if wanted; good terms. Have other business. R. A., care "Camera Craft," San Francisco, Cal.

FOR SALE Classy little cabinet studio, newly fitted up; rent very reasonable; a nice "one man" business in the heart of Oakland; population 278,000. Address, Photo, Top Floor, Blake Block, Oakland, Cal.

FOR SALE the leading studio in a progressive western city of 12,000 population. Studio new and up to date; reception room furnished in solid oak, mission finish; operating room 40 feet square, north light and new Aristo lamp, 8x10 portrait outfit, 8x10 view outfit and 5x7 view outfit. All rooms of studio steam heated. Rent $30.00 per month. Studio enjoys the confidence and patronage of the leading people in the city. An A1 business proposition for a good workman. Price $1500.00. Refer by permission to Fayette J. Clute, Editor of "Camera Craft". Address W. G. Emery, Vancouver, Wash.

RARE CHANCE Own your own studio and stop paying rent. Building 25x50; lot 35x50. Town of about 3,500, county seat of one of the wealthiest counties in the State. No opposition in the county. Established 35 years. Good prices and good business. Want to sell everything, as am interested in automobile business and must devote my entire time to it. Lot, building, stock, and tools, price $2,500. Address, 520 Alameda St., Merced, Cal.

WANTED Cirkut back, 6 or 8 inches, to fit 6½x8½ Century Grand Senior. Either with or without camera. Give full particulars and quote lowest cash price. Address, T. B., care "Camera Craft," San Francisco.

LADYRETOUCHER wanted at once, assist with printing and reception room work. State wages; send samples of work and photo of self. Address Charles Shields, General Delivery, Portland, Ore.

FOR SALE Two new extreme wide angle Anastigmat lenses at half price. Address, Photographer, 911 N. 6th St., St. Louis, Mo.

BURNISHER FOR SALE Globe burnisher, hollow cylinder, gasoline heater; lists at $20.00; best offer takes it; exchange for bicycle, camera, or watch. Mitchell, Box 1551, Seattle, Wash.

8x10 CAMERA City view; Goerz Celor lens; finest outfit on the market; like new; cost $175 last year; first order takes it for $100. Mitchell, Box 1551, Seattle, Wash.

GRAFLEX 4x5 with Goerz Dagor 5x7 lens; plate-holders, film-pack adapter, leather carrying case; lists $165; sell for just half. Mitchell, Box 1551, Seattle, Wash.

FOR SALE Old established, up-to-date studio in Seattle, Wash.; fine location; doing good business; cheap, on easy terms; must sell. Address, Elite Studio, Port Townsend, Wash.

FOR RENT First-class photo studios in Maddock and Minnewaukan, N. D. Doing a good business. Want to sell outfit and fixtures, full equipment up to 8x10. Rent of building reasonable. Reason have other business to attend to. Address, A. E. Johnson, Minnewaukan, N. D.

WANTED Man to develop and finish view work during July, August, and September. Give experience, age, etc., and wages expected. Address, H. A. Knapp, Lisbon, N. D.

FOR SALE 3A Kodak; good condition; case, tank, plate adapter, plate holders, portrait and wide angle lenses; pocket steel tripod; $30.00. Address E. W. H., care "Camera Craft," San Francisco, Cal.

HELP WANTED A young man to represent us on the road; must know the photo supply business from A to Z. Write, giving references and other qualifications. Z. T. Briggs, P. S. Co., 914 Grand Ave., Kansas City, Mo.

FOR SALE Photo-engraving plant, excellent camera and lens, also screens, router, saw. Anxious to sell at sacrifice. Hanford Photo Engraving Co., Hanford, Cal.

PHOTO ENGRAVING An exceptional opportunity for three young men to learn practical photo-engraving. For particulars address Box 8, care "Camera Craft," San Francisco, Cal.

FOR SALE Studio; fine location; Portland, Ore; very low price, $400 down, balance easy terms. Address Ashton, 72 Selling-Hirsch Bldg., Portland, Ore.

FOR SALE cheap, 6½x8½ viewing outfit with three lenses. A rare bargain. Jos. Kuehl, 1221 S. 9th St., Sheboygan, Wis.

WANTED Lady or gentleman assistant for general studio work, one who can do printing and retouching or learn it. Write for full particulars to C. Amidoff Bloomquist, Cresco, Iowa.

FOR SALE Only studio in city of 3,000, drawing from 20,000 population in radius of four miles; nearest opposition eight miles. Will invoice close to $1,000.00; $400.00 cash takes it. Address, Foulk Bros., Fairchance, Pa.

No Job Too Large — No Job Too Small

I DO CAMERA REPAIRING

and do it right. Anything in photographic equipment built or repaired. Call or write.

G. E. BIDDELL, The Camera Doctor

693 Mission St., Cor. Third — San Francisco

THE FINEST AMERICAN MADE

Gelatine Postcard

Platino, Sepia, Olive and Hand-Colored.

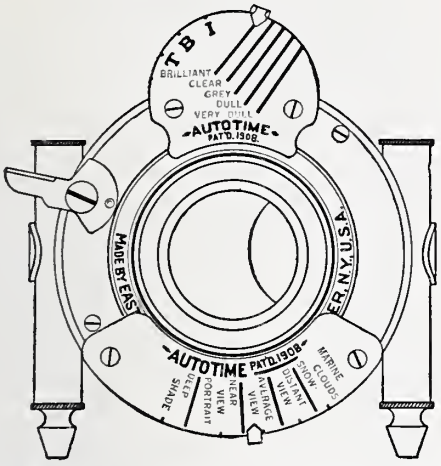
THE ALBERTYPE CO.

250 Adams Street — Brooklyn, N. Y.

Souvenir Albums and Booklets

Eastman Kodak Company

ROCHESTER, N. Y., *The Kodak City.*



THE AUTOTIME SCALE.

When you were about to make a Kodak negative, how many times have you asked yourself, what stop shall I use and how long an exposure shall I give? Experience has probably taught you what to do, but still you pause and consider conditions for a while, and then make the exposure according to your best judgment, with a slight feeling of uncertainty as to whether you have pursued just the proper course.

The Autotime scale does away with that feeling of uncertainty and is easily comprehended. For example, you wish to photograph an incoming lake boat from the pier, and the sun is shining brightly. How would you do it? With the regular diaphragm scale you would probably set your diaphragm on 8 or 16, the usual diaphragm openings for instantaneous exposures in good light—that is you would do just that unless you had made negatives under the same conditions before and found them overtimed and flat, as they would be under such conditions.

With the Autotime scale you need not tax your memory as to your previous experience—in fact, if you have had no previous experience in making a negative under such conditions, you can, with this device, do it successfully. Just set your diaphragm indicator at the "marine" mark and the speed indicator at "brilliant" (see illustration) and then squeeze the bulb.

An old adage says, "Be sure you're right, then go ahead," and this is especially applicable in the making of negatives. The Autotime Scale makes it very easy to be sure you're right—easy to decide as to the proper diaphragm for all occasions, and for regulating the speed of the shutter on the different speeds used in making instantaneous exposures.

For bulb exposures and long time exposures you have sufficient opportunity for using your judgment as to the length of the exposure, but for most of your work—your outdoor work, the Autotime Scale will solve your problems for you and enable you to produce perfectly timed negatives.

It is being widely and successfully used, and this fact establishes beyond a doubt that it is practical and entirely satisfactory. Those who use it get results. It is easy to get results without it by using a little care and by exercising some judgment, but easier to get results with it, especially under conditions entirely new to you.

The price is one dollar, and the equipment simply replaces the regular plates on the lens and shutter mounting. They are easily and quickly attached, and your dealer knows all about them. See him today about fitting you up.

Our package Developer, re-developer, fixing bath and other chemical preparations are made with

TESTED EK CHEMICALS

the kind that produces results.

Eastman Kodak Company
ROCHESTER, N. Y., *The Kodak City.*

PHOTOGRAPHY UNIVERSAL

It seems hard to find in this world a place to which photography has not penetrated. Wherever civilized man goes, the camera goes with him as a matter of course, and even those whom we are not accustomed to regard as our equals in modern culture seem to be taking kindly to this most interesting art. One of the most inaccessible regions of the earth is Chinese Turkestan, a desert country ringed about by the highest mountain chains on earth. A recent French explorer has traversed this country, and made most interesting archeological discoveries. With an account of these we do not care to burden our readers. What interested us most in his account was a description of his visit to Ouroumtchi, the capital of Chinese Turkestan. Here he found in exile a man formerly of great power in China, Duke Lan, cousin german to the late Emperor, and brother of the great Boxer chieftain of 1900, Prince Touan. In this memorable uprising of the Chinese against the foreigners Duke Lan took a prominent part, and as a result thereof he was degraded from his rank and banished for life to the farthest regions of the Empire. In his exile he kills time by taking snap-shots with a Kodak. How films and chemicals reach this isolated spot is one of the mysteries of commerce, but they not only traverse ten thousand weary leagues of sea, river, and desert trail, but get through in good condition, mute testimony to the inventive genius and manufacturing skill of Rochester, N. Y.—*American Photography.*

Develop your Kodak Films in

THE KODAK FILM TANK

"The Experience is in the Tank."

RUNNING WATER.

When photographing swiftly moving water such as rapids or falls it is of course necessary to make an instantaneous exposure if a sharp image of the water formation is desired. Very often the banks of the stream—the precipice adjoining the falls on either side and the water itself are in deep shadow and the problem is to secure a fully timed negative and at the same time get a clear sharp picture of the moving water. If you time for the shadows the water will blur and if you make a snap shot of the water you have an undertimed negative.

After considering this proposition it seems hopeless but there is a way—a way to secure a full timed negative and at the same time secure a picture of the running water without showing movement. The Kodak should be set upon a good rigid tripod or some other solid support as it is very important to have it immovable during the making of the negative. Set the shutter for an instantaneous exposure, using the usual stop for this purpose. Then make a series of snap shots, using great care not to move the Kodak between exposures. Unless the stream or falls is in deep shadow three or four instantaneous exposures will be sufficient to secure a full timed negative.

The banks of the stream—the foliage, etc., is of course immovable and each succeeding snap shot exposure records them in the same position. The falls or rapids retain the same general formation and each exposure catches that formation possibly slightly changed but the image on the negative is always sharp. A bit of spray or a new wave may be added each time but the general effect in the finished picture is sharp and clear.

If your summer outings find you and your Kodak in some such location where you wish to secure a negative under similar conditions you will be able to do it by following this method of procedure—all you have to do is to set the Kodak firmly and proceed.

Eastman Kodak Company

ROCHESTER, N. Y., *The Kodak City.*

OUTING DAYS

You are undoubtedly planning one or more outings. Possibly your vacation trip or just a day or two now and then devoted to your favorite recreation.

It may be fishing. The days when you rise with the sun and in the cool gray dawn trace your way stealthily along the banks of the stream where Jack and you had such great sport last season. You cast the fly and feel the thrill of the strike—the vibration of the line as it tightens and cuts the water with a swift side sweep. The pole bends—you play the fish—he leaps and fights but is yours—your legitimate prize. Then you hear splashing up stream. You arrive in time to see the sport. A four pound bass is at the other end of Jack's line and he is having some trouble keeping him in deep water and free from the log in midstream. If Jack can land him, he will have the "biggest ever" and he is straining every muscle and matching his strategy against that of the fighting fish. Here's a picture. The fight will last for minutes and Jack is unconscious of everything except the struggle. The rippled lighting on the water—the pretty shrubbery on the other bank—the trees—the sky—all make a natural background for the man, the rod and the splashing finny fighter.

Did you slip that Kodak in your pocket? How much would you give to have that picture as you see it before you? How much would Jack give after the excitement to possess pictures of the battle? How your folks and friends would like to see things as they happened. Then too after the sport is ended there is still another picture. We have all heard fish stories more or less remarkable, some of which we have given credence and others which we have swallowed with a grain of salt. A Kodak picture of the day's catch will substantiate your fish story and your fish story is the one you want believed.

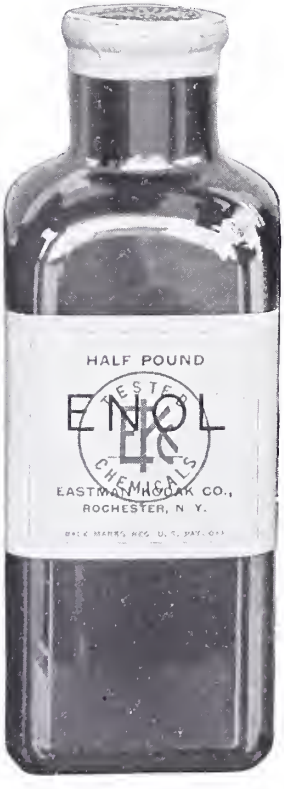
To prove the size of the fish you catch, photograph them near something of well known size—perhaps as in the illustration

—the cat-tails giving them a relative proportion for size they would not have if photographed alone.

With the Kodak you may picture the many interesting events of the fishing trip and come home with negatives instead of regrets for having failed to take a Kodak with you; and the same applies to every thing whether it's sailing or bathing—hunting or camping—whether it is one day—a week or weeks away from home. Whether you go to a fashionable watering place or into the wilds of nature you will find pictures waiting for you—pictures that are yours with each snap of the Kodak shutter.

A perfect developing agent of remarkable vitality is

ENOL



For use in combination with hydrochinon.

Enol-hydrochinon developer keeps well and does not deteriorate rapidly when in use. An excellent developer for both negatives and prints.

EASTMAN KODAK CO.
ROCHESTER, N. Y.

All Dealers.

Made for the Kodak by Kodak experts

Eastman

NON-CURLING N-C

Film

The dependable film, is your protection against failure.

Look for Eastman N-C on the box, and Kodak on the spool end.

EASTMAN KODAK CO.
ROCHESTER, N. Y.

Please Mention Camera Craft when Corresponding with Advertisers.

Two names that you have confidence in—

KODAK

and

ZEISS

are back of the Zeiss-Kodak Anastigmat *f* 6.3. The lens that is made especially for hand camera use.

All Dealers.

EASTMAN KODAK COMPANY,
ROCHESTER, N. Y.

This Light-lock Absolutely Protects

A series of small spring fingers automatically closes the slide opening at every point, so that even if you insert a slide cornerwise, no fogging can occur. It is one of the special patented, inimitable features of

The Premo Adapter

Do not spoil good film by taking chances with cheap, imitative makeshifts. Insist upon the Premo Adapter—the only device which will allow you to load your plate camera with the Premo Film Pack, with the absolute assurance of clear, unfogged negatives.

The Premo Adapter will convert your plate camera into a daylight loading film instrument, will allow you to focus on the ground glass between each exposure and to remove one or more films for tray or tank development, at any time. It will double the value of your outfit, but be sure to get the fully patented adapter provided by the manufacturers of the film pack itself. Insist upon the PREMO ADAPTER—the adapter with the HINGED BACK.

Complete catalog at the dealer's, or mailed free on request.

ROCHESTER OPTICAL DIVISION
EASTMAN KODAK COMPANY
ROCHESTER, N. Y.

A Style That Will ALWAYS Bring THE PRICE

For High Class Baby Pictures, Wedding and Class Groups

The Steffens Portfolio

Rich Grey and Sepia leather finished albums containing a dozen mounts—just an altogether

DIFFERENT STYLE

The kind that will give your customer a rich, flexible album for the two or three photos they keep.

Remember, for your best grade at highest prices, insist on your dealer showing you the STEFFENS PORTFOLIO.

Designed and Manufactured by

Taprell, Loomis & Company :: Chicago, Ill.

The Leading Card Novelty House of America

Read what we say about this style on page 12 of our 1910 catalog

Bausch & Lomb-Zeiss TESSAR LENS

SPEED is only *one* of the qualities of **TESSAR** which is practically a universal lens.

¶ With a **TESSAR** you can go to the limit in every direction of photographic art.

¶ It is unexcelled for ultra rapid work, for portraits, groups, landscapes, etc.

¶ Bausch & Lomb Compound Shutter is simple, compact and durable.

¶ Set of sample prints showing scope of the **TESSAR LENS** on receipt of ten cents.

¶ Our new Photographic Catalog is ready now—copy obtainable at Photo Dealers or direct on request.

Our Name on a Photographic Lens, Microscope, Field Glass, Laboratory Apparatus, Engineering or any other Scientific Instrument is our Guarantee.

Bausch & Lomb Optical Co.

NEW YORK WASHINGTON CHICAGO SAN FRANCISCO
LONDON ROCHESTER, N.Y. FRANKFORT

Please Mention Camera Craft when Corresponding with Advertisers.

THE "BROMLEY" PANEL

FURNISHED IN FOUR COLORS

Light Cream or Ash Grey, for Black and White Photos
India or Mercedes Brown, for Sepia Photos

It is adapted for heavy papers, but may be used for solid mounting as well, being of very substantial stock. The edge is plain beveled, and having no center border, it will accommodate various sizes of photos

Size	Size of Card	Per 1000
48	$4\frac{3}{4}$x$8\frac{1}{2}$	$20.00
59	$5\frac{1}{2}$x$9\frac{5}{8}$	22.50
812	$8\frac{1}{2}$x$12\frac{1}{2}$	47.50

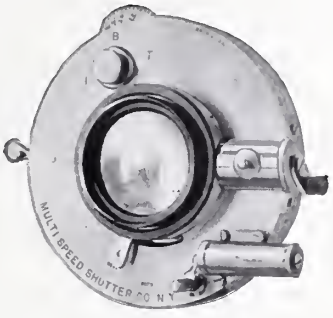
When ordering state color desired

CALIFORNIA CARD MANUFACTURING CO.

Mariposa and Potrero Ave. **San Francisco, Cal.**

Our handsome new catalogue is now ready for distribution. Every photographer should have a copy of this finely illustrated list, showing the most Up-to-Date Cards and Folders ever offered. Send your name and address at once so as to be sure and receive a copy. It will be sent only to Professional Photographers.

Several Reasons Why the Multi Speed Shutter is the Best



FOR SPEED WORK

BECAUSE of its great speed and light giving qualities, brought about by the peculiar compound operation of the blades, enabling one to photograph the most rapid action without the slightest trace of distortion. In this field, particularly, this shutter has absolutely no equal, not excepting the Focal Plane Shutter, as can be demonstrated by simultaneous tests.

FOR LANDSCAPE WORK

BECAUSE it will make pictures of great depth of focus, or of beautiful soft backgrounds, at the will of the operator, owing to a diaphragming effect obtained in the movement of the shutter-blades (peculiar to this shutter alone.)

FOR PORTRAITURE

BECAUSE it does not attract the attention of the sitter, owing to its silent operation, and gives either great depth of focus, or the softness preferred by some.

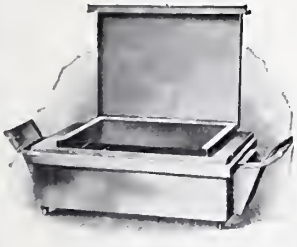
BECAUSE of its simplicity of operation—all speeds from 1-100 to one second being obtained by rotating a small cap on the air piston, and higher speeds up to 1-2000 seconds by more spring tension.

BECAUSE of its simple and reliable mechanism of few and substantial parts, which are not liable to get out of order. (Therefore our offer of one year's guarantee.) And

BECAUSE it is an all around shutter to be used on the ordinary Camera for any or all kinds of work, and with al no heavier, and little longer than other between lens shutters, while the Focal Plane Shutter is at best a cumbersome affair, mostly used in connection with Cameras hardly fit for anything but speed work.

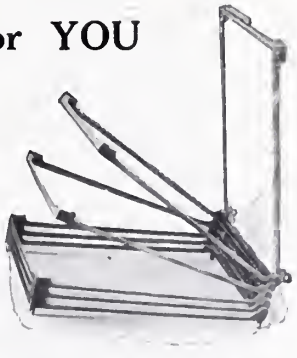
We could write a volume about its numerous advantages, but we would prefer that you give it a fair trial of ten days. Ask your dealer about it and if he cannot satisfy you, write us.

Something Else New For YOU



A tank in which plates are developed horizontally, a far superior method to upright development, notwithstanding imaginary objections. If you have any doubt about this we will suggest a very simple way in which you can try it out.

The most convenient and practical plate rack ever devised. Development can be watched through a glass screen and plates removed separately at will.



MULTI SPEED SHUTTER COMPANY

161-163 West 24th Street **New York City, N. Y.**

Kodak Supplies

TAKE A

KODAK

WITH YOU

Make the most of every outing by keeping a Kodak record of your trip.

Developing

and

Printing

We employ skillful workmen and our work will please you.

R. A. Leet & Co.

1111 Broadway, Oakland, Cal.

Will You Read This Valuable Book on Photography?

Do you want to know the facts about picture taking,—how to tell a good camera from a bad one,—what kind of camera will take the pictures you want to make,—what kind of camera will make the pictures you can easily sell,—how to start in the fascinating art of Picture Making,—in short, do you want to be a successful photographer?

A Seventy-Six Page Text Book-Catalog FREE

Our Latest Compendium, containing just the information you are looking for, covering completely the photographic field, showing you clearly the points you must know, brimful of condensed, valuable information on all the latest photographic apparatus.

Do you want this book?

The edition is limited, but you can get a copy by asking your dealer, or if his supply is exhausted, send your name and address to us at once.

A New Seneca Creation

Filmett "A" with Senior Shutter (Bulb and Tube) Showing Film Pack Partly Inserted.

Seneca Camera Mfg. Co.

DEPT. H

Rochester, N. Y.

Largest Independent Camera Makers in the World

We Wish To Arrest

Your attention, Mr. Photo Supply Dealer to the three points on which we are building our amateur finishing business.

Quality
Permanence
Service

Let us show you how to raise your kodak developing, printing and enlarging department to the highest efficiency. Others have profited by our extensive experience, why not you?

The Photo Craft Shop

849-851 ELLIS ST. SAN FRANCISCO, CAL.

BERRY'S

Photographic **MATTS**

PRINT VERY ATTRACTIVE

FANCY BORDERS FOR PHOTOGRAPHS

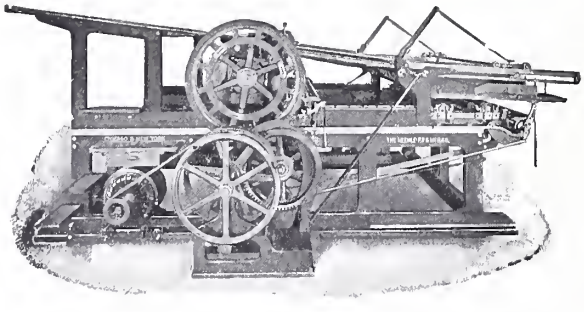
WORK WITH ALL DEVELOPING AND PRINTING OUT PAPERS

At Dealers or Direct

16-20 State St. CHICAGO **G. GENNERT** 24-26 E. 13th St. NEW YORK

The Miehle

"CAMERA CRAFT" IS PRINTED ENTIRELY ON MIEHLE PRESSES



THE MIEHLE PRINTING PRESS AND MANUFACTURING CO.

Main Office and Factory, CORNER FOURTEENTH and ROBEY STREETS, CHICAGO, ILLINOIS

"DAGOR"
"CELOR"
"SYNTOR"

GOERZ
XEXCELL
AND
TENAX
SHUTTERS

GOERZ LENSES

For all kinds of photographic work, give results that no other lenses can even approach

HIRSCH & KAISER, 218 Post St., San Francisco, Pacific Coast Distributing Agents for
C. P. GOERZ AMERICAN OPTICAL CO., Office and Factory, 79 East 130th St., New York
Makers of Goerz Lenses, Goerz Binoculars and Goerz Cameras

"Equipment de Luxe"
The Graflex *Fitted with a* **Steinheil Lens**

The Special 7 inch Focus
UNOFOCAL LENS
is made particularly for the 3 A Graflex. Its speed —F.4.5— makes instantaneous work possible indoors.

Established 1855

Studies of the little folks at play in the home to "stopping" the fastest racing automobile. Speed of shutter up to 1-1000 second.

Price complete, - - - - $125.00
Subject to 10 days' trial.

Catalogue sent on application

HERBERT & HUESGEN
Sole U. S. Agents for Steinheil Lenses
311 Madison Avenue NEW YORK

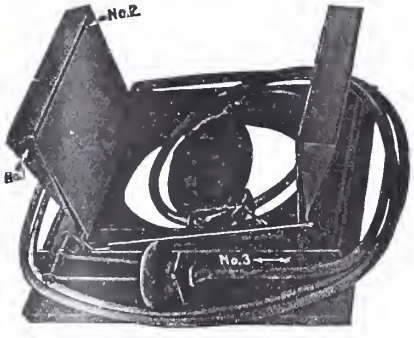
Please Mention Camera Craft when Corresponding with Advertisers.

Photo Post Cards

We want every professional photographer using post cards to write us for our special prices on Kruxo. The Kruxo card is equal in quality to the best and lower in price than the lowest. They are coated on the best imported stock—are non-curling and yield beautiful tones. Rich sepias are easily produced without re-developing by means of the new sepia in-first-development process, instructions for which are inclosed in every package. Write us to-day—to-morrow you may have forgotten all about it.

Newberry's 1306 Fillmore St. San Francisco, Cal.

Pacific Coast Distributers—Kruxo Paper



Notice how simple they are made.

"Silence is Golden"

The professional photographer appreciates the advantage of a silent shutter. When that desirable feature is combined with a simple and scientific construction, one doing away with all cogs, ratchets, valves, scraping wings, and the like, one then has the ONLY SILENT STUDIO SHUTTER. It "opens without a sound."

They are patented and made only by us. Be sure your order reads S-I-L-E-N-T, and accept no other. For sale by all jobbers. Its best recommendation—thousands of satisfied users.

Manufactured only by

Conley Camera Company,

Rochester, Minnesota

WOLLENSAK

=Versar Lens F.6=

From a Versar "Home Portraiture" Negative by L. A. Dozer.

¶The name **VERSAR** was given to this lens to indicate "versatility" as it is adapted for gallery work, home portraiture or view work. It is light in weight and small in size so is easily carried with an out-door outfit, but has sufficient speed so that it can be used under almost any circumstances. It is particularly desirable for the photographer in a small town who wishes one lens to do all his work and many leading photographers who have a dozen gallery lenses are using it for home portraiture. The **VERSAR** is furnished in a variety of mountings and in all sizes from 4x5 to 17x20.

¶In strictly professional lenses our **VITAX F-3.8** and **SERIES A., F.5** are unexcelled in their respective fields.

Catalogue sent free from factory or can be had at any photo stock dealers as they all handle "Wollensak" products.

Wollensak Optical Co.

288 Central Ave. Rochester, N. Y.

Imperial N.F. Plates

A Reproduction of a Yellow Label, Green Lettering and Brown Box Cover—made with the

IMPERIAL
NON-FILTER
PLATE

Notice the exceptional rendering of color values. No ray filter necessary.

G. GENNERT

CHICAGO NEW YORK

LANTERN SLIDES PHOTOGRAPHS POST CARDS

OF THE

SITES, SCENES, CEREMONIES
COSTUMES & CHARACTERS

OF THE

HOLY LAND and of EGYPT

Pressed Wild Flowers of Palestine on Cards and in Albums large and small, ornamental, Biblical and botanical.

Olive-Wood Biblical Cabinets of seeds and other articles.

Raised Maps of Jerusalem.

Bibles and Prayer Books bound in olive-wood.

Olive-Wood and Mother-of-Pearl Souvenirs in great variety.

Masonic Gavels and other articles of stone from Solomon's Quarries and of native woods.

Correspondence Solicited.

FR. VESTER & CO.

American Colony Stores

Jerusalem - - - Palestine

¶"The principle of the Anti-Trust law is that those engaged in modern business, especially of manufacture and transportation, shall pursue the policy with respect to their competitors of 'live and let live,' and that they shall not use the bigness of their concerns to frighten exclusive patronage and eliminate smaller concerns from competition."—*Extract from President Taft's Speech, Lincoln Dinner, February 12, 1910.*

THE NEW MODEL

HALL MIRROR CAMERA

Box Is Made of Imported Metal

Prices are extremely low and within the reach of everyone.

4x5 - $30.00 without lens

3¼x5½ $35.00 without lens

5x7 - $50.00 without lens

Any standard plate holder or film pack fits the Hall Mirror Camera.

The lowest priced and the most reliable camera on the market, more compact and lighter than any other make. Its simple construction places it in a class by itself. It has less number of parts than any other reflecting camera and will not get out of order. The self-adjusting hood is a deep chamber excluding all light and giving a sharp image while allowing all parts of the plate to be seen with accuracy. **Quick wind.** It has the only true way to release a focal plane shutter, the pressure of a button, thus eliminating all vibration. Fitted with an adjustable slot, manipulated from outside of camera. The Hall Mirror Camera is adapted to all kinds of Photography, its range is from stationary to the most rapidly moving objects. Its action, 1-1500 part of a second; the object is reflected upon the ground glass Right Side Up. The focal plane shutter is of a novel type, working directly in front of plate or film. **The camera will stand any climate; no warping as the box is made of Imported Metal.**

THE HALL DIAMOND MIRROR CAMERA

Cheapest and Best Reflecting Camera in the World
Film Pack Size 2½x4¼, Price, with lens, $19.50

Request your dealer to order one for you at once

THE HALL PORTABLE DARK ROOM

The Hall Camera Company

14-18 Dunham Place, Brooklyn, New York

DEVELOPING

If you want to develope into a first class photographer, our school has the right facilities and the more important requisition, the right method. Our system of teaching is based on an understanding of the use of light and shade, just as a painter must be taught the use of color. The location is an ideal one. Mrs. South takes the best of care of the lady pupils. And don't forget, we teach you

COLOR PHOTOGRAPHY ON PAPER

Our handsome new catalogue, the finest one ever issued, sent free on request.

THE KEYSTONE SCHOOL OF PHOTOGRAPHY
W. C. South, Principal
Box C, Downingtown, Pa.

KODAKS

We carry only the latest models and a full line of supplies.

Lessons in Photography by Mail

MARSH-GIRVIN CO.

712 Market St., San Francisco

Kodaks and Photo Supplies

THE HALES CAMERA

Read This Over Carefully

Has all the advantages of the mirror type of camera combined with the **compactness** of the ordinary folding. Up-to-date in every way and guaranteed to do the highest class of work. Focal Plane Shutter. Sizes, 4x5 to 8x10. Send stamp for Circular C.

HALES CAMERA CO., INC.

RIDGEWOOD, N. J.

CRAMER PLATES AND CRAMER FILTERS

REPRESENT

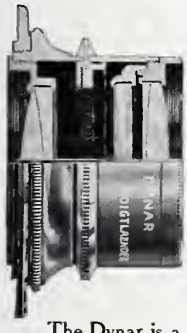
The Highest Combination of Photographic Excellence

For Hot Weather Troubles

CRAMER PLATES

Are Unsurpassed

G. CRAMER DRY PLATE COMPANY St. Louis, Mo.



Voigtländer

A lens capable of the finer quality of work and a lens that is well within the reach of the conservative buyer.

A lens that will give you **extreme definition**—that will cover the **corners** of the plate as well as the center; that is entirely free from all aberration and that has speed—that lens is the

Dynar F:6

The Dynar is a lens of new design, of very compact construction, is extremely light, and is **anastigmatic.** Its **speed,** F:6, makes it an ideal lens for hand and pocket cameras, where a diversity of subjects in all sorts of weather demands rapidity.

In the Dynar you have a lens that **is fast, light, compact** and **anastigmatic.** Added to this you have a lens of the **Voigtlander Quality,** with the Voigtlander Optical Works' century of experience in lens making to guarantee its excellence.

Ask Your Dealer for the Dynar

VOIGTLANDER & SOHN OPTICAL WORKS
BRAUNSCHWEIG, GERMANY

AMERICAN BRANCHES
617-631 Jackson Boulevard, CHICAGO
225 Fifth Avenue, NEW YORK CITY

Makers of the Famous Heliar and Collinear Lenses; Telescopes, Binoculars and Microscopes also the Voigtlander Reflex and Voigtlander Alpine Cameras. BOOKLETS MAILED ON REQUEST

W. ROB WHYTE

SCENIC PHOTOGRAPHER
MELROSE, CAL.

Developing	Printing
Copying	Enlarging
Fair Price	Best Work

Patronized by the Chief of the Biological Survey, Washington, D. C.

CITY OFFICE: CALL BUILDING, S. F.

The Right Kind of a Shutter

Does its work SMOOTHLY and DOES IT EVERY TIME. The right kind of a shutter is an insurance against annoyance and delay. A shutter that has the endorsement of years of usage by thousands of the best photographers is pretty certain to be about the best obtainable. Such a one is the

PACKARD-IDEAL

It is made in all sizes and styles for time and instantaneous exposures, and each one sold under an absolute guarantee. Write for a booklet describing the various styles. All dealers carry them, and remember, they are manufactured only by

MICHIGAN PHOTO SHUTTER CO.
205 East Water Street, KALAMAZOO, MICH.

BROMIDE ENLARGEMENTS

Reduced Prices on all Sizes from Original Films or Plates

8x10 ..... 20c.	10x12 ..... 35c.	11x14 ..... 50c.
14x17 ..... 60c.	16x20 ..... 75c.	20x24 ..... $1.25

Add 25% for Sepia Toning. Send for complete price list.
Cash must accompany all orders. All work guaranteed the best.

Special Attention Given to Kodak Developing and Printing . . . .

G. W. MILLER,
COMMERCIAL PHOTOGRAPHER
1831-1833 Devisadero Street, San Francisco, Calif.

HAND COLORED LOCAL VIEW POST CARDS

MADE TO ORDER

Made from any fair photo and delivered in 2 to 3 weeks..... **$7.20** For 1000

THE BEST MADE IN AMERICA
SEND FOR SAMPLES

Blue Delft (Two Colors) **$5.00** For 1000

Season, Floral, Comics, Greeting Cards, etc.
direct from factory.

NATIONAL COLORTYPE CO.
DEPT. L CINCINNATI, O.

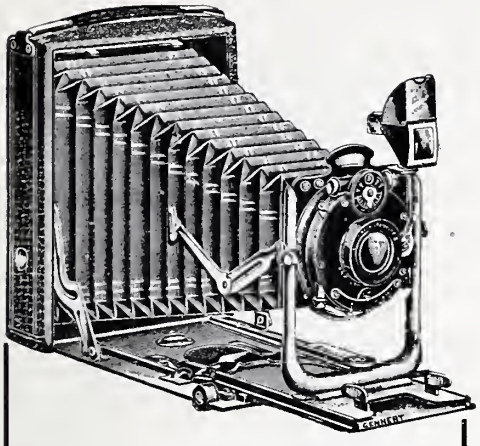
STRATHMORE QUALITY

Most people like to see nice things; choice things. Perhaps this is particularly so of mounts and folders for their photographs. The "STRATHMORE QUALITY" stocks will help you meet their tastes and your ideas.

Old Stratford Old Cloister
Rhododendron

Most Photographic or Paper Houses can supply these Covers, or we will send a large book to the Professional and smaller ones to the Amateur.

MITTINEAGUE PAPER COMPANY
THE "STRATHMORE QUALITY" MILLS
MITTINEAGUE, MASS., U. S. A.



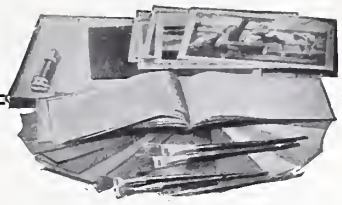
The SYLVAR CAMERA

SIZE 3¼x5½ AND 3¼x4¼

Fitted with Compound Shutter and Sylvar Anastigmat Lens F 6.8

Send for Descriptive Circular

16-20 State St. CHICAGO **G. GENNERT** 24-26 E. 13th St. NEW YORK



One well colored photograph is worth more than a dozen of the ordinary uncolored kind

Coloring your pictures in an artistic and effective manner becomes easy with our self-blending colors. For over twenty years the standard. Ask your dealer and insist on getting the dependable kind. For those wishing to order direct we have a full outfit:

Set of fifteen colors, the necessary brushes, full instructions, and a hand-colored Velox print

$1.00 POSTPAID

Japanese Water Color Co.

Dept. C. 144 East 34th St., New York City

TRUE COLOR VALUES

In photographs can be obtained only when a Color Filter is used. Gives tone values to foliage, flowers and sky otherwise unobtainable.

Ingento Color Filter

Photograph colors in their correct color values. Without a filter red and yellow appears black in the print. With the filter they appear bright, as in nature. **Made in Three Grades and All Sizes.**

Series A. For General Use. The fastest filter made. Requires but three times normal exposure. Adapted for general landscape and snapshot work.

Series B. Wallace's Visual Luminosity. An absolute filter for any Iso or Ortho plate, requiring eight times normal exposure.

Series C. For reds and yellows. Slightly over-corrected to give strong effects in sea, clouds and general landscape work. For copying paintings, highly colored labels, etc. Adapted for commercial photographers. **Prices from $1.00 to $6.00,** according to series and size.

Each Ingento Filter undergoes a rigid spectroscopic test and is guaranteed accurate.

FOR SALE EVERYWHERE. Send for Booklet or Ask Your Dealer.

Burke & James Jackson Blvd. & Desplaines Street **Chicago**

HAUFF'S

(RESUBLIMED)

PYROGALLIC ACID

A Heavy White Powder
Very Compact

Chemically Pure

A Liberal Sample Sent Free to Professional Photographers

G. GENNERT

CHICAGO NEW YORK

THREE GRAINS OF

Victor Flash Powder

IN A

Victor Portrait Flash Cabinet

produced the above. Both Powder and Cabinet are *unequaled* in effectiveness. Send for full descriptive circulars to

JAS. H. SMITH & SONS CO.

725 E. 39th St. Chicago

ANY responsible dealer is authorized to sell you **Crown Anastigmat Lenses** with the guarantee that they are *equal* to any lenses on the market irrespective of price or make. If you do not find them so, your money will be cheerfully refunded.

Why not ask your dealer to get you one?

Made in two series, f 6.3 and f 6.8, and all sizes from 3¼x4¼ up to 11x14. *Catalogs and circulars sent upon request.*

For Sale by Western Photo Supply Co., Distributers

CROWN OPTICAL COMPANY

ROCHESTER :: :: :: :: :: NEW YORK

Successful Flashlight Workers Use

LUXO POWDER

because it is

THE MOST BRILLIANT
THE MOST RAPID

30 Cents and $1.00 per box

At All the Photo Supply Stores

THE LUXO COMPANY, Manufacturers

PHILADELPHIA

GOING AFIELD THIS SUMMER?

THE STANWIX

TELEPHOTO LENS

will double your pleasure

Fits any 3¼ x 5½, 4 x 5 or 5 x 7 shutter

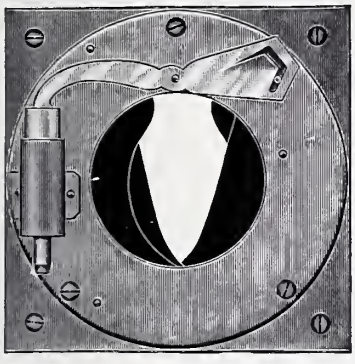
Enlargements 3 to 5 Diameters

PRICE, $10.00

We make other lenses, too
Send for complete Catalog 11

STANDARD OPTICAL CO.

Newark *New Jersey*



THE LOW SHUTTER No. 6

For time and instantaneous exposures. Quickly and easily changed from one to the other by pushing in a small pin. No other adjustments to make. It is quick and easy in action, the wings moving with absolute uniformity, opening and closing with great speed. There are no springs, gears, or toggle joints to wear or get out of order. Will last a life time. The same as our No. 10 except that it works back of the lens. Square base.

Opening	Outside	Price	Opening	Outside	Price
			2½ in.	4¾ in.	6.00
1 in.	2 in.	$5.00	2¾ in.	5¼ in.	6.50
1½ in.	3 in.	5.50	3 in.	5¾ in.	6.50
1¾ in.	3⅜ in.	5.50	3½ in.	6 5-16 in.	6.50
2 in.	3⅞ in.	6.00	4 in.	6¾ in.	7.00
2¼ in.	4½ in.	6.00	4½ in.	7¾ in.	8.00

Other Makes Repaired. Write for Folder C.

Kalamazoo Shutter Co. **Kalamazoo, Mich.**

CARL ZEISS
JENA

Simplicity of construction, sharpness of definition, brilliancy of the image, and chromatic correction, make the

SERIES 1c TESSAR made by CARL ZEISS, Jena

the best lens made for portraiture, cinematograph work and all ultra-rapid photography

E. B. Meyrowitz

OPTICIAN

SOLE U. S. AGENT

0104 East 23d Street, New York

Branches

NEW YORK ST. PAUL MINNEAPOLIS
LONDON PARIS

PLATES suited to summer use must dry quickly with firm, tough films and without tendency to frilling.

The most rigid tests have shown that HAMMER'S Special Extra Fast (red label) and Extra Fast (blue label) Plates possess these qualities in the highest degree.

They hold the record for work in the tropics and will meet the severest demands of heat and humidity in any climate.

Hammer's Little Book, "A Short Talk on Negative Making," mailed free.

Hammer Dry Plate Company

Saint Louis, - - - Missouri

The Famous "AL-VISTA" Panoramic Camera

The 5D Model shown herewith is equipped with our Extra Rapid Symmetrical lens, pivoted finder, fan retarding device, and our patent attachment for making negatives of different lengths. You can make a picture five inches high by any length up to sixteen inches. Remember, you could not buy a lens of any value, that would cut a plate sixteen inches long, for what you pay for this camera and lens complete, **Only $35.00**

SEND FOR CATALOGUE GET OUR PRICES ON ALL PHOTOGRAPHIC SUPPLIES

Partee Photo Supply Co.

1223-25-27 Wabash Ave.
Chicago : : Illinois

Successors to THE MULTISCOPE & FILM CO.

PERFECT PRINTS ⁂ DEALERS WANTED

Your negatives will yield perfect prints when you use the right paper---KRUXO. You have many negatives no doubt that are not ideal printers. Kruxo will give you satisfactory prints from any negative, whether it be thin and weak, normal or contrasty.

Our Free Booklet

tells HOW to select paper for each negative; HOW to modify developer formulas to obtain special effects; HOW to make any shade of sepia in first development.

Send 10 cents for samples

Today. Be sure to state whether for professional or amateur photography; also whether for views or portraits.

IT CONQUERS THE TRADE. KRUXO TRADE MARK THE PERFECT DEVELOPING PAPER.

There is a widespread demand for Kruxo papers, post cards and chemicals. Extensive circularizing and advertising are increasing this demand. If we are not represented in your locality this trade is going by mail to some dealer elsewhere who handles Kruxo products.

If You Knew

the volume of trade you are losing because you cannot fill orders for KRUXO products, you would hustle to get into line for the season of 1910. It will be worth your while to send for

Our Dealer's Proposition

It is liberal. Discounts are right and enable you to sell to the consumer at prices that win trade and hold trade.

KILBORN PHOTO-PAPER CO., 109-113 FIRST AVENUE CEDAR RAPIDS, IOWA

OUR NEW COLORED SEPIA LOCAL VIEWS

SELL QUICKLY

Quicker than any other kind of View Post Cards Therefore they are also more profitable to you They will please your most critical customers

Merely send us a photo of any style or kind and we'll do the rest.

ASK FOR SAMPLES TO-DAY

E. C. KROPP COMPANY

Dept. Z Milwaukee, Wis.

Manufacturers of High Grade Post Cards since 1898

Seltona ETO

COLLODION

MADE IN FOUR GRADES

Matt, Cream Crayon, Antique and Glossy

The Century's Best P. O. P.

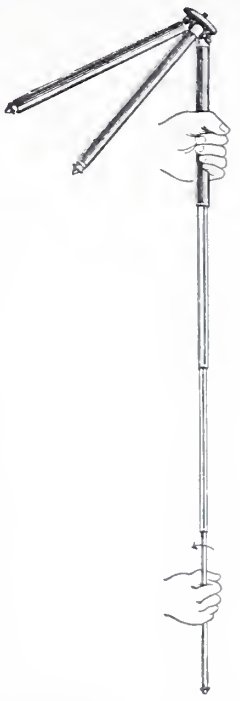
Send 30 cents for one dozen postals and a copy of Perfect Prints free.

SPEED 400 H. & D.

Fastest Ortho Plate in the world. Used without a Screen, it gives equally efficient color rendering to other Ortho Plates with a two times screen.

J. L. LEWIS

379 Sixth Ave. New York



The Quick-Set Metal Tripod

Embodying All the Features of a Good Tripod

RIGID – when extended
COMPACT—when closed
QUICK—when operated

The Quick-Set is RIGID because made of brass tubing, nickel plated. When extended it is a continuous rod of metal and will bear any reasonable weight.

The Quick-Set is COMPACT because when closed it is shorter than any other make, when extended longer.

The Quick-Set is QUICK because it can be extended in a moment by pulling out each leg fully and giving a short twist to the left, securely locking all sections at once.

The Quick-Set eliminates all the defects found in other makes of tripods. It has no buttons or pins, and the legs cannot become loosened.

	Sections	Length Extended	Length Closed	Price
No. 51	3	40 inches	15 inches	$2.25
No. 52	3	54 "	16½ "	2.35
No. 53	4	49 "	14 "	3.00
No. 55	5	50 "	12 "	4.25
No. 56	5	57 "	13½ "	4.50
No. 60	5	50 "	12 "	5.00
No. 75	4	50½ "	15 "	4.75

Insist on your dealer showing you the QUICK-SET METAL TRIPOD or write us.

GEORGE MURPHY, Inc.

59 East Ninth Street New York

Send Ten Cents for our new 1910—three hundred page catalogue—just issued

NO TRIAL NECESSARY

When purchasing the Royle Router Cutter you get an approved article accepted and used by the most progressive houses everywhere.

Sold by
Geo. Russell Reed Co.
645 Battery Street
San Francisco, Calif.

MAKERS,

JOHN ROYLE & SONS, Paterson, N. J., U. S. A.

Dependable Photo-Engravers' Machinery

Graflex Cameras

Some things you can do with a Graflex

Make exposures from time to 1-1000 of a second.
Make "Snap Shots" indoors.
Make instantaneous exposures on dark days.
See the composition of the picture, right side up, full size of negative up to the instant of exposure.
Secure better photographs than with any other camera.
Graflex Cameras may be used with Roll Film, Plates or Film Pack.

Graflex Cameras from $60.00 to $200.00.
Catalog free at your dealer's, or,

Folmer & Schwing Division
EASTMAN KODAK CO.
Rochester, N. Y.

"TOLIDOL"

The Perfect DEVELOPER

Ideal for **Plates, Films and Papers**

STAINLESS, NON-POISONOUS
UNINJURIOUS

Clear, crisp NEGATIVES and very ECONOMICAL

Send for price list.

The Tolidol Co. **Clinton, Wis.**

SOLD OUT

The unexpected heavy demand for my last book, "Complete Exposure Method and Home Portrait Helps," necessitates a new edition. This will be made much more full and complete with new and better pictures and several important additions to the text. The book will be larger and the binding of leather. The price will be $1.00. In the meanwhile the Aaba Exposure Scales will be sent post paid for half price. 25 cents. "Home Portraiture", the standard book on the subject, which will soon be out of print, 75 cents.

F. M. Steadman Box C Concord, N. H.

ARN Mazeograph PROCESS

FOR FINISHING COMPLETE **POSTCARDS and PHOTOS** IN TEN MINUTES

"The Mazeograph Course" teaches how to finish Photos or Postcards in **ten minutes**. Every detail is fully described and formulas given; no part of the operation is omitted, there is nothing similar to this process. It is copyrighted, and all rights reserved, except by my contract with those purchasing the Course," my object is to teach [by this "Course"] my method obtaining good, permanent results in ten minutes, there further information.

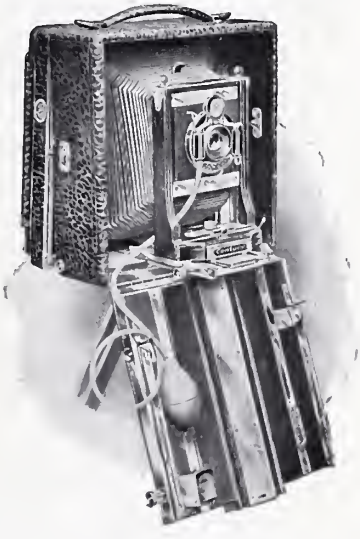
PRICE $1.00

C. E. CALVERT
Hawthorne Terrace Portland, Ore.

ighting in Photography

New and simple method by daylight, and artificial light, both in the Skylight and at home. Illustrated prospectus sent free on demand.

C. KLARY, 103 Avenue de Villiers
Paris, France



Century Cameras

The highest degree of photographic efficiency, combined with substantial construction and richness of finish constitute

CENTURY QUALITY.

Our Catalog, free on request, fully describes Century Cameras, Cirkut Cameras and Century View Cameras.

CENTURY CAMERA DIVISION,
EASTMAN KODAK CO. Rochester, N. Y.

Our Clubbing Offers

Canadian and Foreign Postage rates vary with the different Magazines.

		Our Price.
CAMERA CRAFT	$1 00	$1.50
Sunset Magazine	1 50	
Three Sunset Indian Posters, 22x28 printed in 2 colors		
	$2 50	
CAMERA CRAFT	$1 00	$1.65
Esperanto and	1 00	
Full Text Book of Esperanto	1 00	
or any other one of the following		
Success	1 00	
Cosmopolitan	1 00	
American	1 50	
American Boy	1 00	
Pacific Monthly	1 50	
CAMERA CRAFT	$1 00	$2.00
Success	1 00	
Designer	50	
	$2 50	
CAMERA CRAFT	$1 00	$2.25
Human Life	1 00	
Ideal Homes	1 00	
	$3 00	
CAMERA CRAFT	$1 00	$2.25
Cosmopolitan	1 00	
or any other one of the following		
Success	1 00	
Good Housekeeping	1 00	
Ideal Homes	1 00	
Human Life	1 00	
American Magazine	1 00	
CAMERA CRAFT	$1 00	$2.35
Sunset Magazine	1 50	
American	1 50	
CAMERA CRAFT	$1 00	$2.50
Delineator	1 00	
Everybody's	1 50	
	$3 50	
CAMERA CRAFT	$1 00	$2.65
McClure's Magazine	1 50	
Woman's Home Companion	1 25	
	$3 75	

		Our Price.
CAMERA CRAFT	$1 00	$2.75
Cosmopolitan	1 00	
American	1 50	
Good Housekeeping	1 00	
	$4 50	
CAMERA CRAFT	$1 00	$3.00
Delineator	1 00	
World's Work	3 00	
	$5 00	
CAMERA CRAFT	$1 00	$3.00
Review of Reviews	3 00	
and any one below:		
Cosmopolitan	1 00	
American	1 50	
Metropolitan	1 50	
Success	1 00	
Good Housekeeping	1 00	
CAMERA CRAFT	$1 00	$3.25
Woman's Home Companion	1 25	
Review of Reviews	3 00	
	$5 25	
CAMERA CRAFT	$1 00	$3.25
Suburban Life	3 00	
With Good Housekeeping	1 00	
or American	1 50	
CAMERA CRAFT	$1 00	$3.25
Everybody's	1 50	
World's Work	3 00	
	$5 50	
CAMERA CRAFT	$1 00	$3.25
Current Literature	3 00	
With Good Housekeeping	1 00	
or American	1 50	
CAMERA CRAFT	$1 00	$4.00
World's Work	3 00	
Everybody's	1 50	
Delineator	1 00	
	$6 50	
CAMERA CRAFT may be added to any combination you want. Get our price. We will also duplicate any combination offered by others and include CAMERA CRAFT for fifty cents additional.		50 cts.

CAMERA CRAFT

713-715 Call Building — San Francisco, California

SUNSET FOR AUGUST

THE BLACK GOLD OF CALIFORNIA. The romance of the oil wells, by Walter V. Woehlke. A live story, like a moving picture film, of the stirring history of big strikes in oil, of gushers that shot into the air sudden wealth for patient prospectors. Illustrated with many pictures and portraits of present day interest.

UNCLE SAM'S ISLANDS. A story of the Philippines by Ex-Governor James F. Smith Beginning of a series of carefully written articles dealing with our island possessions, from the view point of a man who has helped make them what they are and who believes firmly in their economic value to the United States. Illustrated by remarkable photographs from the Government's collection.

...*Special Articles*...

HOW FIRE HELPS FORESTRY, by George L. Hoxie. A novel and authoritative plea for the use of forest fire as servant to prevent its ultimate appearance as master. Is the Federal service simply laying fire for the future?

GROWLING AT MEXICO, by Robert H. Murray. The writer has examined, on the ground, the difference between American and "Amurican" erities of the Mexican government.

...*Fiction*...

THE WHIRLPOOL GORGE, by Edward Lucas White.

O-JII-SAN, by Marjorie L. C. Pickthall.

ROMANCE OF THE LITTLE CONDUCTOR, by Leona Anstine Sutter.

THE EYE AT THE KNOT-HOLE, by Frederick F. Moore.

THE SPLICIN' OF MISS BROWN, by C. G. Adams.

Further instalments of Stewart Edward White's fine novel of the big woods, "The Rules of the Game," Little Stories of the West and miscellaneous material relative the big country west of the Rockies.

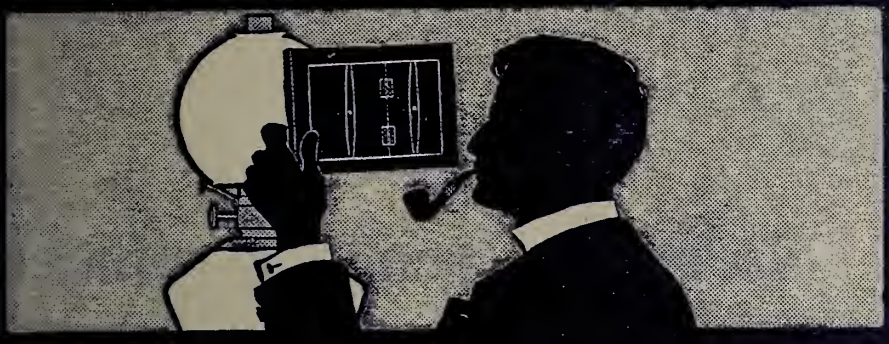
"Agfa" Products

have a standard of purity and uniformity which commands the attention of those who desire only the best."

The above sentiment represents the composite expression of opinion of the representative photographic men of the country obtained after thorough solicitation.

BERLIN ANILINE WORKS

213-215 WATER ST. NEW YORK



VELOX

The name that means good prints to every amateur.

NEPERA DIVISION,
EASTMAN KODAK CO.,
ROCHESTER, N. Y.

No toning chemicals required with

Aristo Gold Paper

Just print, wash and fix to secure beautiful carbon effects.

AMERICAN ARISTOTYPE DIVISION,
EASTMAN KODAK COMPANY,
JAMESTOWN, N. Y.

All Dealers.